CUADERNILLO DE PREGUNTAS

Saber 3°, 5° y 9° 2014

Cuadernillo de prueba

EJEMPLO DE PREGUNTAS
Saber 5° Matemáticas

MINEDUCACIÓN
icfes mejor saber
TODOS POR UN NUEVO PAÍS
PAZ EQUIDAD EDUCACIÓN

Presidente de la República
Juan Manuel Santos Calderón

Ministra de Educación Nacional
Gina María Parody d'Echeona

Viceministro de Educación Preescolar, Básica y Media
Luis Enrique García De Brigard

Directora General
Ximena Dueñas Herrera

Secretaria General
María Sofía Arango Arango

Director de Evaluación
Andrés Gutiérrez

Director de Producción y Operaciones
Francia del Pilar Jiménez

Directora de Tecnología
Ingrid Picón Carrascal

Jefe Oficina Asesora de Comunicaciones y Mercadeo
Jimmy Alexander Lugo Guerrero

Jefe Oficina Gestión de Proyectos de Investigación
Luis Eduardo Jaramillo

Subdirectora de Producción de Instrumentos
Martha Ligia Cuevas Mendoza

Subdirector de Diseño de Instrumentos
Diego Fernando Lemus Polanía

Subdirectora de Análisis y Divulgación
Silvana Godoy Mateus

Adaptación y elaboración del documento
Martha Jeanet Castillo Ballén

Diseño y diagramación
Gustavo Andrés Álvarez Mejía
Alejandra Guzmán Escobar

ISBN de la versión digital: En trámite

Bogotá D.C., Abril de 2016

MINEDUCACIÓN

icfes mejor saber

TODOS POR UN NUEVO PAÍS
PAZ EQUIDAD EDUCACIÓN

ADVERTENCIA

Con el fin de evitar la sobrecarga gráfica que supondría utilizar en español "o/a" para denotar uno u otro género, el ICFES opta por emplear el masculino genérico en el que todas las menciones de este se refieren siempre a hombres y mujeres.

Todo el contenido es propiedad exclusiva y reservada del ICFES y es el resultado de investigaciones y obras protegidas por la legislación nacional e internacional. No se autoriza su reproducción, utilización ni explotación a ningún tercero. Solo se autoriza su uso para fines exclusivamente académicos. Esta información no podrá ser alterada, modificada o enmendada.

ICFES. 2016. Todos los derechos de autor reservados ©.

TÉRMINOS Y CONDICIONES DE USO PARA PUBLICACIONES Y OBRAS DE PROPIEDAD DEL ICFES

El Instituto Colombiano para la Evaluación de la Educación (ICFES) pone a la disposición de la comunidad educativa y del público en general, **DE FORMA GRATUITA Y LIBRE DE CUALQUIER CARGO**, un conjunto publicaciones a través de su portal www.icfes.gov.co. Dichos materiales y documentos están normados por la presente política y están protegidos por derechos de propiedad intelectual y derechos de autor a favor del ICFES. Si tiene conocimiento de alguna utilización contraria a lo establecido en estas condiciones de uso, por favor infórmenos al correo prensaicfes@icfes.gov.co.

Queda prohibido el uso o publicación total o parcial de este material con fines de lucro. **Únicamente está autorizado su uso para fines académicos e investigativos**. Ninguna persona, natural o jurídica, nacional o internacional, podrá vender, distribuir, alquilar, reproducir, transformar ([1]), promocionar o realizar acción alguna de la cual se lucre directa o indirectamente con este material. Esta publicación cuenta con el registro ISBN (International Standard Book Number, o Número Normalizado Internacional para Libros) que facilita la identificación no sólo de cada título, sino de la autoría, la edición, el editor y el país en donde se edita.

En todo caso, cuando se haga uso parcial o total de los contenidos de esta publicación del ICFES, el usuario deberá consignar o hacer referencia a los créditos institucionales del ICFES respetando los derechos de cita; es decir, se podrán utilizar con los fines aquí previstos transcribiendo los pasajes necesarios, citando siempre la fuente de autor) lo anterior siempre que estos no sean tantos y seguidos que razonadamente puedan considerarse como una reproducción simulada y sustancial, que redunde en perjuicio del ICFES.

Asimismo, los logotipos institucionales son marcas registradas y de propiedad exclusiva del Instituto Colombiano para la Evaluación de la Educación (ICFES). Por tanto, los terceros no podrán usar las marcas de propiedad del ICFES con signos idénticos o similares respecto de cualesquiera productos o servicios prestados por esta entidad, cuando su uso pueda causar confusión. En todo caso queda prohibido su uso sin previa autorización expresa del ICFES. La infracción de estos derechos se perseguirá civil y, en su caso, penalmente, de acuerdo con las leyes nacionales y tratados internacionales aplicables.

El ICFES realizará cambios o revisiones periódicas a los presentes términos de uso, y los actualizará en esta publicación.

El ICFES adelantará las acciones legales pertinentes por cualquier violación a estas políticas y condiciones de uso.

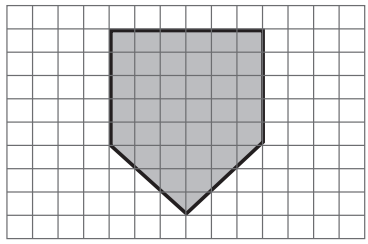
* La transformación es la modificación de la obra a través de la creación de adaptaciones, traducciones, compilaciones, actualizaciones, revisiones, y, en general, cualquier modificación que de la obra se pueda realizar, generando que la nueva obra resultante se constituya en una obra derivada protegida por el derecho de autor, con la única diferencia respecto de las obras originales que aquellas requieren para su realización de la autorización expresa del autor o propietario para adaptar, traducir, compilar, etcétera. En este caso, el ICFES prohíbe la transformación de esta publicación.

SABER 5

SABER 5 - PRUEBA DE MATEMÁTICAS

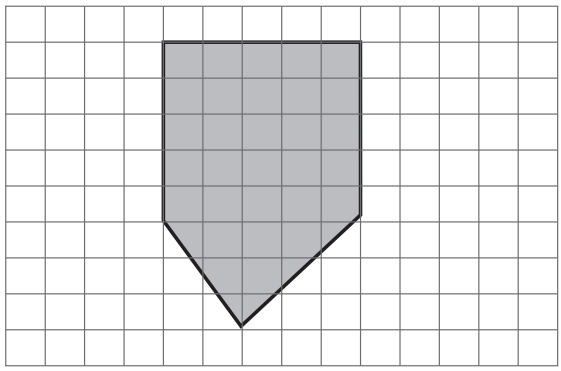
- **Pregunta 1.**

Federico dibujó la siguiente figura.

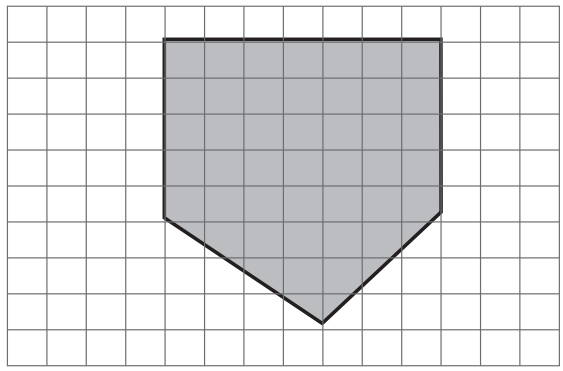


Figura

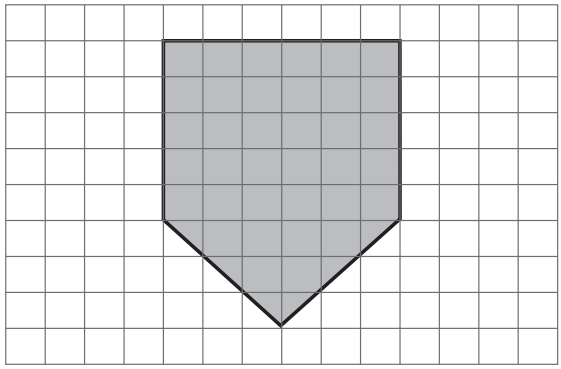
Luego la vio ampliada con una lupa. ¿Cuál de las siguientes figuras vio Federico?

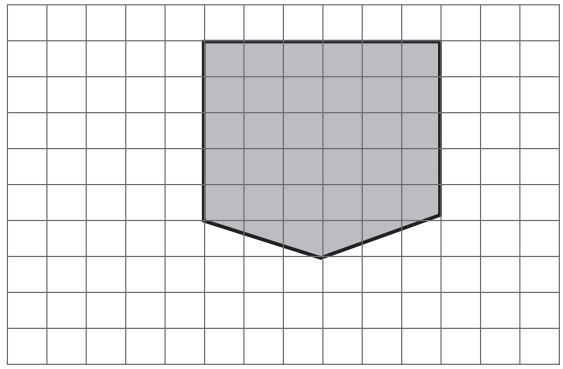


C.



D.





• Estructura

Competencia	Razonamiento
Componente	Espacial - Métrico
Afirmación	Justificar relaciones de semejanza y congruencia entre figuras.
Nivel de desempeño	Mínimo
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	16.2%	16.4%	60.8%	4.9%	1.7%	978
Antioquia	13.4%	15.1%	66.7%	3.6%	1.2%	29373
Apartadó	15.4%	15.0%	64.4%	3.2%	2.0%	1757
Arauca	12.1%	12.8%	71.6%	3.0%	0.4%	2680
Armenia	13.2%	12.4%	71.1%	2.5%	0.8%	2580
Atlántico	15.2%	14.0%	64.7%	4.0%	2.1%	5978
Barrancabermeja	14.1%	14.6%	67.7%	2.8%	0.8%	2488
Barranquilla	13.0%	14.4%	68.5%	3.3%	0.7%	12401
Bello	12.5%	15.3%	68.1%	3.4%	0.6%	3836
Bogotá, D.C.	10.6%	12.6%	73.4%	2.6%	0.8%	66877
Bolívar	19.1%	14.9%	59.6%	4.7%	1.7%	11163
Boyacá	12.2%	13.4%	71.2%	2.8%	0.3%	9265
Bucaramanga	10.2%	11.6%	75.2%	2.5%	0.5%	5300
Buenaventura	17.2%	15.9%	60.0%	4.8%	2.1%	4160
Buga	11.5%	12.2%	73.3%	2.3%	0.7%	1238
Caldas	10.7%	13.4%	72.0%	3.3%	0.6%	5750
Cali	12.1%	13.4%	70.7%	3.0%	0.9%	19641
Caquetá	14.8%	15.9%	64.7%	3.7%	0.9%	3265
Cartagena	15.4%	14.9%	64.9%	3.6%	1.2%	11457
Cartago	12.2%	11.0%	73.0%	2.4%	1.3%	1274
Casanare	12.8%	14.0%	68.6%	4.1%	0.6%	3072
Cauca	13.5%	15.4%	65.1%	4.3%	1.7%	12628
Cesar	14.3%	15.5%	65.1%	4.2%	0.9%	8483
Chocó	19.2%	16.2%	58.4%	4.1%	2.1%	3852
Chía	7.9%	12.4%	75.9%	3.2%	0.6%	1448
Ciénaga	16.3%	13.0%	64.6%	4.5%	1.6%	1516

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Cundinamarca	10.2%	12.5%	74.2%	2.6%	0.6%	16374
Córdoba	16.6%	15.5%	62.5%	4.5%	1.0%	13351
Cúcuta	11.6%	13.5%	71.7%	2.6%	0.6%	7404
Dosquebradas	10.6%	12.7%	73.6%	2.1%	1.0%	1863
Duitama	7.9%	12.1%	76.8%	2.8%	0.3%	1408
Envigado	9.3%	13.0%	74.8%	2.3%	0.6%	1415
Facatativá	9.7%	12.2%	75.6%	2.3%	0.2%	1412
Florencia	13.6%	13.6%	68.3%	3.8%	0.8%	2075
Floridablanca	9.7%	11.9%	75.7%	2.3%	0.4%	2586
Fusagasugá	10.8%	12.5%	73.5%	2.4%	0.8%	1232
Girardot	14.0%	12.3%	67.8%	3.7%	2.2%	895
Girón	12.8%	13.3%	71.3%	2.2%	0.4%	1523
Guainía	11.2%	15.3%	68.1%	3.1%	2.3%	517
Guaviare	14.7%	16.1%	64.2%	3.8%	1.2%	914
Huila	11.8%	13.0%	72.1%	2.8%	0.4%	8204
Ibagué	9.4%	11.6%	75.9%	2.6%	0.4%	5546
Ipiales	11.4%	14.1%	71.0%	3.2%	0.3%	1485
Itagüí	13.3%	15.9%	66.3%	3.5%	1.0%	2028
Jamundí	15.1%	13.8%	66.7%	3.4%	1.0%	1103
La Guajira	17.6%	15.0%	60.9%	4.8%	1.7%	3931
Lorica	17.9%	12.0%	65.9%	3.1%	1.1%	1541
Magangué	17.3%	14.4%	63.2%	3.8%	1.4%	1648
Magdalena	16.0%	14.4%	63.3%	4.5%	1.8%	9172
Maicao	20.4%	16.2%	57.3%	4.3%	1.9%	2162
Malambo	13.9%	13.1%	68.0%	4.0%	1.0%	1278
Manizales	9.2%	12.0%	76.0%	2.2%	0.6%	3145
Medellín	14.9%	16.0%	64.9%	3.2%	1.0%	20621
Meta	14.1%	15.4%	66.4%	3.3%	0.8%	6012
Montería	14.9%	15.2%	65.4%	3.8%	0.8%	5509
Mosquera	8.2%	13.6%	75.3%	2.3%	0.5%	1286
Nariño	11.1%	13.0%	71.6%	3.0%	1.2%	9299
Neiva	13.1%	12.5%	71.2%	2.8%	0.4%	3661
Norte de Santander	11.1%	14.3%	70.9%	3.0%	0.7%	8026
Palmira	9.4%	11.6%	76.1%	2.4%	0.4%	2836
Pasto	10.6%	11.5%	75.6%	2.0%	0.4%	4034
Pereira	10.7%	12.0%	74.7%	2.3%	0.4%	4349
Piedecuesta	9.8%	14.2%	73.1%	2.5%	0.5%	1481
Pitalito	12.0%	13.8%	71.0%	2.8%	0.4%	1582
Popayán	10.4%	14.6%	71.0%	3.2%	0.7%	3086

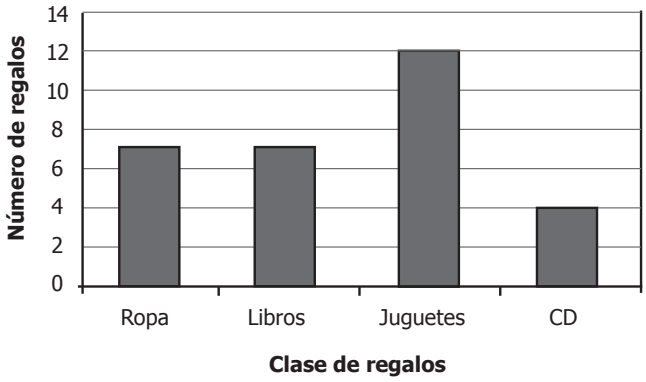
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Putumayo	13.6%	13.2%	68.2%	3.8%	1.3%	4142
Quibdó	18.3%	14.4%	61.7%	4.0%	1.6%	1317
Quindío	12.2%	11.1%	72.8%	2.8%	1.1%	2449
Riohacha	17.0%	17.5%	59.7%	4.2%	1.7%	2582
Rionegro	9.5%	14.2%	73.2%	2.6%	0.5%	1185
Risaralda	10.9%	13.9%	71.3%	3.0%	1.0%	2810
Sabaneta	9.4%	14.9%	73.2%	2.2%	0.4%	511
Sahagún	13.8%	13.2%	67.9%	3.5%	1.5%	1213
San Andrés	18.4%	12.6%	65.2%	3.1%	0.7%	555
Santa Marta	15.0%	15.0%	65.5%	3.4%	1.1%	5826
Santander	11.4%	13.2%	72.4%	2.6%	0.4%	8664
Sincelejo	14.3%	15.8%	66.4%	2.7%	0.8%	3217
Soacha	12.4%	14.9%	69.1%	3.0%	0.6%	5620
Sogamoso	10.3%	15.4%	71.7%	2.4%	0.2%	1503
Soledad	13.0%	14.8%	68.0%	3.3%	0.8%	5505
Sucre	16.9%	15.6%	63.1%	3.6%	0.8%	7730
Tolima	12.4%	13.7%	69.7%	3.2%	1.0%	9717
Tuluá	9.8%	12.9%	74.4%	2.3%	0.5%	2129
Tumaco	21.9%	19.3%	51.1%	5.5%	2.1%	2375
Tunja	9.1%	11.3%	77.0%	2.3%	0.3%	1871
Turbo	17.5%	16.9%	58.6%	5.1%	1.8%	2122
Uribia	22.7%	21.1%	47.1%	6.6%	2.5%	1095
Valle del Cauca	12.7%	12.7%	71.1%	2.9%	0.6%	8498
Valledupar	12.1%	15.2%	68.7%	3.3%	0.7%	5289
Vichada	14.9%	20.2%	56.9%	5.1%	3.0%	779
Villavicencio	12.2%	13.1%	71.0%	3.1%	0.5%	5786
Yopal	12.3%	12.5%	71.9%	2.6%	0.6%	2008
Yumbo	13.0%	13.3%	69.8%	3.0%	0.9%	1265
Zipaquirá	10.3%	12.1%	74.6%	2.5%	0.5%	1284
Colombia	13.0%	14.0%	68.9%	3.2%	0.9%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 2.

Edison recibió regalos en su fiesta de cumpleaños. La gráfica muestra la clase y el número de regalos que recibió.



Gráfica

¿Cuántos regalos en total recibió Edison en su fiesta de cumpleaños?

A. 4
B. 12
C. 23
D. 30

• Estructura

Competencia	Resolución
Componente	Aleatorio
Afirmación	Resolver problemas que requieren representar datos relativos al entorno usando una o diferentes representaciones.
Nivel de desempeño	Mínimo
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	9.8%	28.2%	17.0%	42.2%	2.8%	978
Antioquia	5.8%	23.4%	13.0%	56.3%	1.5%	29373
Apartadó	5.5%	22.7%	15.1%	54.7%	2.1%	1757
Arauca	4.3%	18.6%	10.6%	65.8%	0.7%	2680
Armenia	3.2%	17.3%	14.0%	64.5%	1.0%	2580
Atlántico	5.9%	25.2%	12.4%	54.1%	2.4%	5978
Barrancabermeja	4.6%	18.8%	13.0%	62.2%	1.4%	2488
Barranquilla	4.9%	19.1%	13.2%	61.7%	1.0%	12401
Bello	4.2%	16.2%	14.8%	63.6%	1.1%	3836
Bogotá, D.C.	3.2%	13.5%	12.7%	69.5%	1.0%	66877
Bolívar	8.4%	30.8%	12.9%	45.7%	2.3%	11163
Boyacá	4.2%	16.1%	10.4%	68.8%	0.4%	9265
Bucaramanga	3.4%	13.5%	10.8%	71.8%	0.5%	5300
Buenaventura	6.6%	27.2%	11.8%	51.8%	2.7%	4160
Buga	4.5%	19.0%	12.5%	62.8%	1.1%	1238
Caldas	4.5%	20.0%	11.9%	62.9%	0.7%	5750
Cali	4.3%	16.2%	13.5%	64.6%	1.3%	19641
Caquetá	6.0%	26.6%	12.9%	53.4%	1.1%	3265
Cartagena	6.7%	22.2%	14.1%	55.3%	1.6%	11457
Cartago	3.6%	18.4%	12.9%	63.5%	1.6%	1274
Casanare	4.7%	19.6%	12.3%	62.4%	1.0%	3072
Cauca	6.3%	25.7%	11.7%	54.1%	2.2%	12628
Cesar	7.6%	26.5%	13.3%	51.4%	1.2%	8483
Chocó	9.6%	31.6%	11.6%	44.5%	2.7%	3852
Chía	2.9%	10.5%	11.8%	74.1%	0.7%	1448
Ciénaga	6.3%	32.7%	13.1%	45.3%	2.6%	1516
Cundinamarca	3.3%	14.3%	9.9%	71.8%	0.7%	16374
Córdoba	7.0%	28.7%	13.7%	49.3%	1.3%	13351
Cúcuta	4.4%	18.5%	11.0%	65.2%	0.9%	7404
Dosquebradas	4.2%	15.1%	15.0%	64.5%	1.2%	1863
Duitama	2.9%	8.4%	9.2%	79.3%	0.2%	1408
Envigado	2.3%	10.1%	11.3%	75.5%	0.8%	1415
Facatativá	3.8%	11.8%	11.8%	72.2%	0.4%	1412
Florencia	4.9%	22.6%	12.8%	58.8%	1.0%	2075
Floridablanca	3.2%	11.8%	12.0%	72.3%	0.7%	2586
Fusagasugá	3.0%	16.7%	13.7%	65.6%	1.0%	1232
Girardot	3.5%	23.7%	11.3%	58.9%	2.7%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	4.5%	15.4%	13.0%	66.6%	0.5%	1523
Guainía	6.6%	32.9%	13.9%	44.9%	1.7%	517
Guaviare	6.5%	22.1%	14.3%	56.1%	1.0%	914
Huila	4.4%	20.4%	11.2%	63.4%	0.6%	8204
Ibagué	2.9%	14.3%	9.7%	72.4%	0.7%	5546
Ipiales	4.2%	15.6%	10.8%	68.9%	0.5%	1485
Itagüí	4.1%	15.4%	17.9%	61.4%	1.2%	2028
Jamundí	4.9%	21.5%	15.6%	56.7%	1.4%	1103
La Guajira	8.4%	27.2%	12.5%	49.9%	2.0%	3931
Lorica	6.7%	24.8%	13.0%	54.1%	1.4%	1541
Magangué	8.8%	30.4%	11.7%	47.5%	1.6%	1648
Magdalena	7.2%	31.6%	11.8%	47.4%	2.0%	9172
Maicao	9.3%	28.3%	12.6%	47.8%	1.9%	2162
Malambo	5.9%	23.6%	9.3%	59.2%	1.9%	1278
Manizales	2.9%	14.8%	10.7%	70.9%	0.7%	3145
Medellín	5.0%	19.0%	16.2%	58.7%	1.2%	20621
Meta	4.9%	21.8%	13.8%	58.7%	0.9%	6012
Montería	5.8%	23.9%	13.3%	55.9%	1.2%	5509
Mosquera	2.6%	13.1%	12.9%	70.8%	0.7%	1286
Nariño	5.1%	20.7%	10.8%	61.8%	1.7%	9299
Neiva	4.3%	17.2%	11.9%	65.9%	0.7%	3661
Norte de Santander	4.9%	20.0%	10.7%	63.6%	0.8%	8026
Palmira	3.2%	13.8%	10.7%	71.6%	0.7%	2836
Pasto	3.3%	13.8%	10.9%	71.5%	0.6%	4034
Pereira	4.5%	17.0%	12.8%	65.0%	0.6%	4349
Piedecuesta	4.0%	13.0%	11.2%	71.2%	0.5%	1481
Pitalito	4.3%	16.8%	11.6%	66.9%	0.3%	1582
Popayán	3.1%	17.2%	11.1%	67.9%	0.7%	3086
Putumayo	5.9%	23.9%	11.5%	57.4%	1.4%	4142
Quibdó	7.4%	26.2%	12.8%	51.6%	2.1%	1317
Quindío	3.9%	20.5%	13.3%	61.1%	1.3%	2449
Riohacha	8.3%	26.8%	14.1%	48.6%	2.2%	2582
Rionegro	3.5%	10.6%	10.3%	74.9%	0.7%	1185
Risaralda	4.2%	21.5%	10.7%	62.5%	1.2%	2810
Sabaneta	3.9%	13.5%	13.9%	68.1%	0.6%	511
Sahagún	4.4%	20.9%	13.3%	59.4%	2.1%	1213
San Andrés	4.7%	23.2%	13.2%	57.8%	1.1%	555
Santa Marta	5.7%	23.5%	13.4%	55.9%	1.5%	5826
Santander	4.1%	17.8%	10.5%	67.0%	0.6%	8664

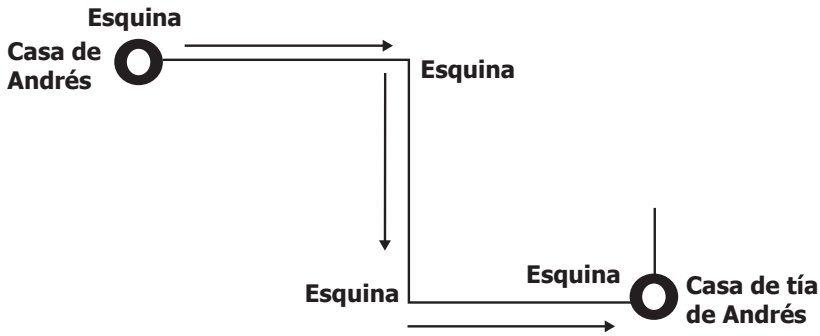
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	4.3%	20.6%	13.6%	60.5%	1.0%	3217
Soacha	3.6%	16.7%	15.2%	63.7%	0.8%	5620
Sogamoso	2.7%	9.6%	9.4%	78.1%	0.3%	1503
Soledad	5.2%	20.2%	12.9%	60.9%	0.8%	5505
Sucre	6.5%	28.0%	13.2%	51.1%	1.2%	7730
Tolima	4.0%	22.3%	11.1%	61.4%	1.2%	9717
Tuluá	3.8%	16.6%	10.2%	68.3%	1.1%	2129
Tumaco	9.8%	33.1%	16.2%	38.4%	2.6%	2375
Tunja	2.7%	10.1%	8.9%	77.9%	0.4%	1871
Turbo	8.6%	32.5%	14.6%	42.4%	2.0%	2122
Uribia	13.5%	33.9%	14.8%	34.4%	3.4%	1095
Valle del Cauca	4.0%	19.7%	12.5%	63.1%	0.7%	8498
Valledupar	5.5%	21.6%	12.1%	59.8%	1.0%	5289
Vichada	6.5%	31.6%	11.8%	46.3%	3.7%	779
Villavicencio	4.3%	16.5%	10.9%	67.6%	0.7%	5786
Yopal	3.9%	20.0%	12.6%	62.8%	0.7%	2008
Yumbo	5.1%	21.7%	14.5%	57.6%	1.1%	1265
Zipaquirá	3.0%	12.1%	10.1%	73.8%	0.9%	1284
Colombia	4.9%	20.0%	12.5%	61.3%	1.2%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 3.

Andrés hace el siguiente recorrido cuando va desde su casa hasta la casa de su tía.



Él demora 5 minutos en ir de una esquina a la siguiente. ¿Cuántos minutos demora en ir desde su casa a la casa de su tía?

A. 3

B. 5

C. 10

D. 15

• Estructura

Competencia	Comunicación
Componente	Numérico - variacional
Afirmación	Reconocer e intepretar números naturales y fracciones en diferentes contextos.
Nivel de desempeño	Mínimo
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	9.8%	17.9%	18.9%	51.4%	1.9%	978
Antioquia	6.9%	10.2%	13.5%	67.9%	1.5%	29373
Apartadó	8.8%	13.1%	14.5%	61.1%	2.4%	1757
Arauca	6.4%	9.0%	13.1%	70.7%	0.9%	2680
Armenia	6.4%	10.1%	11.8%	70.6%	1.1%	2580
Atlántico	9.9%	14.0%	17.3%	56.2%	2.6%	5978
Barrancabermeja	7.3%	9.6%	15.1%	66.4%	1.5%	2488
Barranquilla	8.2%	11.1%	14.1%	65.3%	1.2%	12401
Bello	6.7%	8.2%	11.7%	72.7%	0.8%	3836
Bogotá, D.C.	4.8%	7.1%	11.6%	75.5%	1.0%	66877
Bolívar	11.3%	16.9%	17.6%	51.8%	2.5%	11163
Boyacá	5.6%	7.2%	11.7%	75.0%	0.5%	9265
Bucaramanga	4.5%	7.0%	10.5%	77.2%	0.7%	5300
Buenaventura	11.2%	15.6%	16.3%	54.2%	2.7%	4160
Buga	6.1%	8.3%	14.2%	70.3%	1.1%	1238
Caldas	7.0%	9.5%	12.2%	70.4%	0.9%	5750
Cali	6.4%	9.8%	13.3%	69.3%	1.2%	19641
Caquetá	7.2%	12.4%	14.1%	65.1%	1.3%	3265
Cartagena	9.6%	14.1%	14.5%	60.3%	1.6%	11457
Cartago	6.3%	9.0%	14.4%	68.4%	1.8%	1274
Casanare	5.8%	8.3%	12.3%	72.8%	0.8%	3072
Cauca	7.7%	12.5%	14.7%	62.9%	2.2%	12628
Cesar	10.0%	12.8%	14.1%	62.0%	1.1%	8483
Chocó	10.2%	20.2%	16.8%	50.5%	2.4%	3852
Chía	4.2%	5.2%	10.1%	79.8%	0.7%	1448
Ciénaga	10.0%	14.6%	15.2%	57.4%	2.8%	1516
Cundinamarca	4.7%	7.0%	11.3%	76.3%	0.8%	16374
Córdoba	10.1%	15.1%	16.7%	56.6%	1.6%	13351
Cúcuta	6.6%	9.4%	12.0%	71.2%	0.8%	7404
Dosquebradas	5.9%	8.9%	10.9%	73.3%	1.0%	1863
Duitama	3.4%	5.0%	8.3%	83.0%	0.2%	1408
Envigado	3.7%	5.2%	9.1%	81.1%	0.8%	1415
Facatativá	4.4%	6.9%	10.7%	77.8%	0.3%	1412
Florencia	6.7%	11.4%	13.2%	67.4%	1.4%	2075
Floridablanca	4.9%	7.0%	10.6%	76.5%	1.1%	2586
Fusagasugá	6.3%	5.9%	10.1%	76.7%	1.0%	1232
Girardot	8.4%	11.6%	14.9%	63.0%	2.1%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	5.4%	8.6%	12.0%	73.4%	0.5%	1523
Guainía	11.4%	13.7%	14.3%	57.8%	2.7%	517
Guaviare	7.2%	10.7%	13.2%	67.5%	1.3%	914
Huila	6.2%	9.4%	13.1%	70.7%	0.6%	8204
Ibagué	5.2%	7.4%	11.8%	74.9%	0.7%	5546
Ipiales	4.4%	7.7%	13.2%	73.8%	0.9%	1485
Itagüí	7.0%	9.8%	12.8%	69.0%	1.4%	2028
Jamundí	8.2%	12.3%	16.1%	62.0%	1.4%	1103
La Guajira	10.7%	15.5%	17.0%	54.7%	2.1%	3931
Lorica	9.0%	15.4%	19.1%	54.9%	1.6%	1541
Magangué	10.7%	16.2%	16.4%	55.0%	1.7%	1648
Magdalena	10.9%	15.7%	15.9%	55.1%	2.4%	9172
Maicao	10.6%	15.9%	15.6%	55.4%	2.5%	2162
Malambo	11.4%	10.6%	13.2%	63.1%	1.7%	1278
Manizales	6.3%	6.9%	10.2%	75.9%	0.7%	3145
Medellín	7.5%	10.4%	13.8%	67.0%	1.4%	20621
Meta	7.2%	9.9%	13.2%	68.5%	1.1%	6012
Montería	9.8%	12.7%	16.3%	60.2%	1.1%	5509
Mosquera	3.6%	5.4%	10.2%	80.2%	0.7%	1286
Nariño	5.8%	10.2%	13.7%	68.8%	1.5%	9299
Neiva	6.4%	9.0%	13.5%	70.3%	0.9%	3661
Norte de Santander	5.9%	9.0%	11.5%	72.8%	0.9%	8026
Palmira	6.3%	7.7%	11.5%	73.7%	0.8%	2836
Pasto	4.7%	6.8%	12.0%	76.0%	0.6%	4034
Pereira	6.0%	8.0%	12.8%	72.8%	0.4%	4349
Piedecuesta	5.0%	7.2%	11.2%	75.9%	0.7%	1481
Pitalito	6.0%	10.2%	12.6%	71.0%	0.1%	1582
Popayán	6.7%	6.8%	10.7%	75.0%	0.8%	3086
Putumayo	6.8%	11.2%	15.8%	64.6%	1.5%	4142
Quibdó	11.5%	16.2%	18.2%	51.9%	2.1%	1317
Quindío	7.4%	10.0%	12.6%	68.8%	1.2%	2449
Riohacha	9.6%	15.3%	16.2%	56.4%	2.4%	2582
Rionegro	4.8%	7.3%	10.4%	76.7%	0.8%	1185
Risaralda	6.2%	9.5%	13.1%	70.0%	1.3%	2810
Sabaneta	4.7%	7.8%	10.8%	75.7%	1.0%	511
Sahagún	7.5%	10.5%	15.7%	64.6%	1.7%	1213
San Andrés	9.5%	17.3%	14.6%	57.5%	1.1%	555
Santa Marta	8.8%	13.0%	15.2%	61.7%	1.3%	5826
Santander	5.4%	8.7%	11.0%	74.2%	0.6%	8664

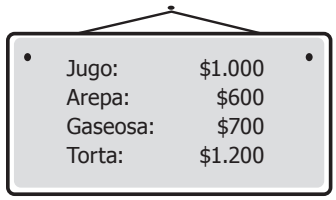
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	9.4%	13.4%	15.0%	60.9%	1.3%	3217
Soacha	5.9%	8.7%	12.7%	71.7%	1.0%	5620
Sogamoso	3.9%	5.3%	10.2%	80.5%	0.2%	1503
Soledad	7.4%	11.3%	12.4%	67.5%	1.4%	5505
Sucre	10.3%	14.6%	17.3%	56.2%	1.5%	7730
Tolima	7.0%	10.8%	13.3%	67.8%	1.2%	9717
Tuluá	5.4%	7.4%	13.3%	73.0%	0.8%	2129
Tumaco	13.3%	21.0%	20.5%	42.2%	3.0%	2375
Tunja	3.7%	4.8%	10.8%	80.2%	0.5%	1871
Turbo	12.0%	17.6%	17.3%	50.8%	2.3%	2122
Uribia	11.0%	20.7%	15.8%	49.1%	3.4%	1095
Valle del Cauca	7.4%	10.6%	13.1%	68.0%	1.0%	8498
Valledupar	7.9%	12.1%	13.5%	65.5%	0.9%	5289
Vichada	9.0%	15.5%	13.5%	58.5%	3.5%	779
Villavicencio	5.3%	9.4%	12.3%	72.1%	0.9%	5786
Yopal	6.5%	9.2%	11.9%	71.5%	1.0%	2008
Yumbo	7.5%	10.4%	13.2%	67.4%	1.5%	1265
Zipaquirá	4.0%	6.7%	10.1%	78.6%	0.6%	1284
Colombia	7.1%	10.4%	13.4%	67.9%	1.3%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 4.

En una cafetería se venden alimentos y bebidas. Este aviso muestra los precios de algunos productos.



Al comprar dos de los productos que aparecen en el aviso, Fabián pagó con un billete de $2.000 y le sobraron $100. ¿Qué productos compró?

A. Jugo y arepa.
B. Jugo y torta.
C. Gaseosa y arepa.
D. Gaseosa y torta.

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver problemas aditivos rutinarios y no rutinarios de transformación, comparación, combinación e igualación e interpretar condiciones necesarias para su solución.
Nivel de desempeño	Mínimo
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	15.5%	13.0%	18.3%	50.6%	2.6%	978
Antioquia	11.1%	10.6%	12.4%	64.1%	1.8%	29373
Apartadó	13.3%	11.3%	13.5%	58.9%	2.9%	1757
Arauca	9.4%	10.2%	11.9%	67.2%	1.3%	2680
Armenia	8.7%	11.0%	12.0%	66.8%	1.6%	2580
Atlántico	13.9%	12.3%	14.2%	56.5%	3.1%	5978
Barrancabermeja	10.9%	9.5%	11.8%	66.4%	1.4%	2488
Barranquilla	11.2%	11.2%	13.1%	63.2%	1.3%	12401
Bello	8.7%	9.6%	10.9%	69.5%	1.2%	3836
Bogotá, D.C.	7.2%	8.8%	10.8%	71.8%	1.2%	66877
Bolívar	17.1%	14.5%	16.2%	49.5%	2.7%	11163
Boyacá	8.5%	9.0%	11.4%	70.4%	0.6%	9265
Bucaramanga	6.7%	6.8%	8.9%	76.8%	0.8%	5300
Buenaventura	13.5%	12.2%	12.2%	59.1%	2.9%	4160
Buga	10.3%	12.3%	11.2%	64.9%	1.4%	1238
Caldas	8.6%	9.3%	10.7%	70.3%	1.1%	5750
Cali	9.0%	10.0%	12.3%	67.2%	1.5%	19641
Caquetá	12.2%	12.0%	12.3%	61.8%	1.7%	3265
Cartagena	12.7%	12.0%	14.0%	59.3%	1.9%	11457
Cartago	7.7%	12.7%	9.7%	67.8%	2.1%	1274
Casanare	9.5%	9.0%	11.4%	68.9%	1.2%	3072
Cauca	12.1%	9.9%	12.2%	63.3%	2.5%	12628
Cesar	13.8%	12.0%	13.0%	59.7%	1.5%	8483
Chocó	17.1%	13.3%	15.8%	50.7%	3.2%	3852
Chía	7.4%	9.0%	10.0%	72.8%	0.8%	1448
Ciénaga	14.8%	13.1%	12.1%	56.7%	3.4%	1516
Cundinamarca	7.3%	8.3%	10.3%	73.0%	1.0%	16374
Córdoba	16.9%	14.3%	16.3%	50.9%	1.6%	13351
Cúcuta	8.7%	8.9%	10.7%	70.4%	1.2%	7404
Dosquebradas	6.7%	7.2%	11.2%	73.6%	1.3%	1863
Duitama	4.8%	6.9%	9.5%	78.6%	0.1%	1408
Envigado	6.0%	8.4%	8.5%	76.2%	0.9%	1415
Facatativá	6.7%	7.9%	10.1%	74.8%	0.6%	1412
Florencia	11.7%	9.8%	11.3%	65.8%	1.4%	2075
Floridablanca	6.7%	8.0%	9.9%	74.6%	0.9%	2586
Fusagasugá	8.0%	7.6%	12.7%	70.5%	1.3%	1232
Girardot	9.9%	9.3%	12.4%	65.5%	2.9%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	6.8%	10.6%	10.2%	71.6%	0.7%	1523
Guainía	14.1%	16.8%	19.9%	46.2%	2.9%	517
Guaviare	13.3%	12.7%	15.1%	57.5%	1.3%	914
Huila	10.0%	9.8%	12.4%	67.0%	0.7%	8204
Ibagué	6.7%	8.6%	10.0%	73.6%	1.1%	5546
Ipiales	8.1%	8.6%	12.0%	70.5%	0.8%	1485
Itagüí	9.6%	11.5%	12.7%	65.1%	1.1%	2028
Jamundí	11.5%	10.8%	15.9%	60.5%	1.4%	1103
La Guajira	15.4%	12.7%	15.3%	54.3%	2.3%	3931
Lorica	15.1%	14.1%	16.3%	52.7%	1.8%	1541
Magangué	17.9%	15.1%	14.9%	50.6%	1.5%	1648
Magdalena	15.5%	12.7%	14.2%	54.9%	2.8%	9172
Maicao	15.5%	13.5%	15.1%	53.8%	2.1%	2162
Malambo	11.9%	10.3%	12.0%	63.6%	2.2%	1278
Manizales	6.8%	9.3%	9.3%	74.0%	0.6%	3145
Medellín	9.7%	11.7%	12.5%	64.6%	1.5%	20621
Meta	10.7%	10.9%	11.7%	65.6%	1.1%	6012
Montería	13.7%	12.2%	13.9%	58.9%	1.3%	5509
Mosquera	6.5%	8.9%	9.0%	74.4%	1.2%	1286
Nariño	10.8%	9.5%	11.9%	65.9%	1.9%	9299
Neiva	9.2%	9.3%	12.1%	68.3%	1.1%	3661
Norte de Santander	8.8%	9.3%	10.7%	70.2%	0.9%	8026
Palmira	7.1%	10.3%	11.4%	70.3%	0.9%	2836
Pasto	7.1%	8.8%	11.8%	71.4%	0.8%	4034
Pereira	8.4%	9.1%	10.3%	71.6%	0.7%	4349
Piedecuesta	7.0%	8.6%	10.7%	72.5%	1.2%	1481
Pitalito	10.1%	9.3%	11.6%	68.3%	0.7%	1582
Popayán	6.7%	8.3%	10.9%	72.8%	1.3%	3086
Putumayo	10.9%	10.4%	13.6%	63.4%	1.7%	4142
Quibdó	14.0%	13.0%	14.6%	56.0%	2.4%	1317
Quindío	9.6%	9.5%	12.7%	66.6%	1.6%	2449
Riohacha	14.6%	12.9%	13.3%	56.7%	2.5%	2582
Rionegro	7.3%	7.9%	11.0%	73.0%	0.8%	1185
Risaralda	9.1%	10.4%	10.7%	68.1%	1.7%	2810
Sabaneta	5.7%	9.8%	12.3%	71.4%	0.8%	511
Sahagún	11.8%	13.3%	14.7%	58.5%	1.7%	1213
San Andrés	15.7%	15.0%	17.5%	51.0%	0.9%	555
Santa Marta	12.8%	11.7%	13.2%	60.5%	1.8%	5826
Santander	9.2%	9.6%	10.9%	69.6%	0.8%	8664

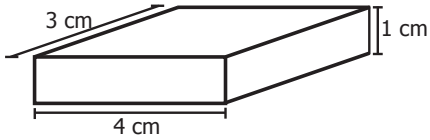
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	12.2%	13.0%	14.5%	59.0%	1.3%	3217
Soacha	8.1%	8.6%	11.4%	70.8%	1.2%	5620
Sogamoso	5.1%	9.1%	9.0%	76.3%	0.4%	1503
Soledad	11.1%	9.7%	11.6%	65.9%	1.6%	5505
Sucre	16.5%	13.7%	16.7%	51.7%	1.4%	7730
Tolima	10.7%	9.8%	12.0%	66.2%	1.3%	9717
Tuluá	8.6%	8.0%	11.2%	71.1%	1.0%	2129
Tumaco	20.8%	14.4%	13.8%	47.5%	3.5%	2375
Tunja	6.5%	7.9%	8.1%	76.8%	0.6%	1871
Turbo	17.4%	15.0%	14.4%	50.8%	2.4%	2122
Uribia	19.0%	16.0%	19.2%	42.1%	3.7%	1095
Valle del Cauca	9.3%	10.4%	12.0%	67.1%	1.2%	8498
Valledupar	12.3%	10.1%	12.8%	63.5%	1.3%	5289
Vichada	14.4%	16.0%	15.0%	49.9%	4.6%	779
Villavicencio	7.2%	8.2%	10.2%	73.5%	1.0%	5786
Yopal	7.1%	8.7%	11.4%	71.5%	1.3%	2008
Yumbo	10.0%	9.9%	14.2%	64.4%	1.6%	1265
Zipaquirá	5.5%	6.4%	8.7%	78.7%	0.7%	1284
Colombia	10.4%	10.4%	12.2%	65.5%	1.5%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 5.

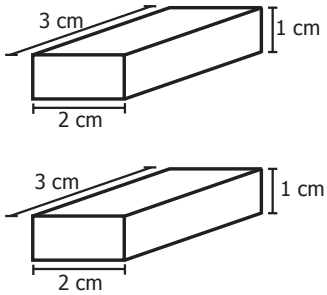
Leonardo quiere construir un sólido como el de la figura, utilizando dos bloques.



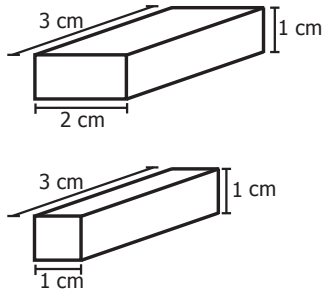
Figura

¿Con cuál de los siguientes pares de bloques, Leonardo puede construir el sólido?

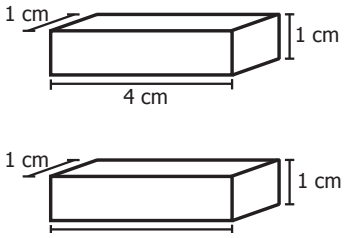
A.



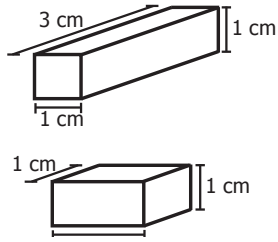
B.



C.



D.



• Estructura

Competencia	Razonamiento
Componente	Espacial - métrico
Afirmación	Construir y descomponer figuras planas y sólidas a partir de condiciones dadas.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	44.2%	17.4%	26.7%	8.9%	2.9%	978
Antioquia	53.9%	14.8%	22.4%	7.0%	1.8%	29373
Apartadó	52.3%	14.7%	23.3%	7.0%	2.7%	1757
Arauca	57.0%	13.0%	22.4%	6.2%	1.4%	2680
Armenia	55.6%	13.9%	23.2%	5.7%	1.6%	2580
Atlántico	49.3%	15.1%	24.8%	7.4%	3.4%	5978
Barrancabermeja	54.4%	14.6%	23.4%	6.3%	1.4%	2488
Barranquilla	52.6%	14.9%	24.9%	6.2%	1.4%	12401
Bello	58.1%	14.0%	20.6%	5.9%	1.4%	3836
Bogotá, D.C.	61.1%	12.2%	20.3%	5.0%	1.4%	66877
Bolívar	44.8%	15.9%	26.7%	9.9%	2.6%	11163
Boyacá	58.5%	13.4%	21.9%	5.5%	0.7%	9265
Bucaramanga	62.1%	12.4%	19.9%	4.7%	0.8%	5300
Buenaventura	50.9%	14.8%	23.8%	7.1%	3.4%	4160
Buga	54.1%	14.2%	23.3%	6.5%	1.8%	1238
Caldas	56.4%	14.0%	21.9%	6.3%	1.4%	5750
Cali	56.9%	13.7%	22.1%	5.6%	1.7%	19641
Caquetá	52.8%	14.3%	23.1%	8.1%	1.7%	3265
Cartagena	52.7%	14.4%	23.5%	7.5%	1.9%	11457
Cartago	57.1%	12.3%	24.2%	4.6%	1.8%	1274
Casanare	55.8%	12.8%	23.8%	6.5%	1.0%	3072
Cauca	55.5%	14.4%	20.4%	7.0%	2.7%	12628
Cesar	51.4%	14.9%	24.3%	8.1%	1.3%	8483
Chocó	47.3%	14.6%	27.0%	8.8%	2.3%	3852
Chía	62.2%	11.5%	21.6%	4.1%	0.7%	1448
Ciénaga	48.2%	14.2%	25.8%	8.2%	3.6%	1516
Cundinamarca	60.3%	12.6%	21.0%	5.1%	1.0%	16374
Córdoba	46.8%	16.4%	25.5%	9.4%	1.9%	13351
Cúcuta	56.6%	13.9%	22.7%	5.6%	1.2%	7404
Dosquebradas	58.8%	14.3%	21.3%	4.2%	1.4%	1863
Duitama	63.2%	12.4%	19.2%	4.6%	0.6%	1408
Envigado	62.2%	12.4%	19.7%	4.7%	0.9%	1415
Facatativá	60.8%	13.0%	19.5%	5.9%	0.8%	1412
Florencia	54.0%	14.4%	24.1%	6.3%	1.1%	2075
Floridablanca	61.8%	14.1%	18.5%	4.5%	1.0%	2586
Fusagasugá	58.4%	13.6%	20.9%	5.9%	1.2%	1232

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girardot	54.9%	13.9%	22.9%	5.0%	3.4%	895
Girón	57.5%	14.8%	21.3%	5.3%	1.0%	1523
Guainía	46.4%	13.5%	27.1%	10.3%	2.7%	517
Guaviare	50.8%	14.0%	24.9%	8.4%	1.9%	914
Huila	58.6%	13.4%	21.8%	5.5%	0.8%	8204
Ibagué	62.0%	11.2%	21.1%	4.7%	1.1%	5546
Ipiales	59.5%	11.4%	21.3%	7.1%	0.7%	1485
Itagüí	52.7%	16.2%	22.0%	7.5%	1.5%	2028
Jamundí	51.9%	16.1%	23.8%	6.2%	2.0%	1103
La Guajira	47.5%	15.1%	26.1%	8.8%	2.5%	3931
Lorica	50.2%	13.7%	26.0%	8.4%	1.8%	1541
Magangué	46.5%	14.8%	28.5%	8.5%	1.7%	1648
Magdalena	47.1%	15.4%	25.7%	9.0%	2.8%	9172
Maicao	45.6%	15.5%	27.4%	8.9%	2.6%	2162
Malambo	52.1%	14.2%	25.9%	5.9%	1.8%	1278
Manizales	62.1%	13.6%	19.0%	4.5%	0.8%	3145
Medellín	52.5%	15.8%	22.8%	7.1%	1.7%	20621
Meta	52.5%	14.3%	24.6%	7.0%	1.6%	6012
Montería	48.2%	16.4%	26.1%	7.9%	1.3%	5509
Mosquera	62.8%	10.9%	20.3%	4.8%	1.2%	1286
Nariño	60.3%	12.0%	20.3%	5.4%	2.0%	9299
Neiva	55.7%	15.3%	22.1%	5.9%	1.0%	3661
Norte de Santander	59.3%	12.8%	20.9%	5.8%	1.2%	8026
Palmira	60.4%	12.2%	20.8%	5.1%	1.4%	2836
Pasto	60.8%	12.1%	21.3%	4.8%	0.9%	4034
Pereira	59.4%	13.2%	21.1%	5.4%	0.9%	4349
Piedecuesta	58.8%	14.0%	19.9%	5.9%	1.4%	1481
Pitalito	58.3%	14.2%	21.0%	5.9%	0.6%	1582
Popayán	57.7%	14.1%	21.5%	5.4%	1.3%	3086
Putumayo	53.3%	14.0%	23.1%	7.7%	1.8%	4142
Quibdó	49.4%	15.6%	23.4%	8.5%	3.1%	1317
Quindío	55.5%	13.7%	23.3%	5.6%	1.8%	2449
Riohacha	47.4%	15.4%	26.5%	8.2%	2.5%	2582
Rionegro	60.2%	12.8%	21.3%	4.8%	0.9%	1185
Risaralda	58.7%	12.3%	21.6%	5.6%	1.9%	2810
Sabaneta	60.5%	13.1%	18.4%	7.0%	1.0%	511
Sahagún	47.8%	14.8%	27.5%	8.2%	1.7%	1213
San Andrés	50.3%	14.6%	26.3%	7.2%	1.6%	555
Santa Marta	50.4%	14.0%	26.0%	7.3%	2.3%	5826

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Santander	61.8%	12.6%	19.3%	5.5%	0.8%	8664
Sincelejo	52.9%	14.0%	24.6%	7.2%	1.3%	3217
Soacha	56.6%	13.7%	22.8%	5.7%	1.2%	5620
Sogamoso	65.9%	12.8%	16.0%	5.1%	0.3%	1503
Soledad	56.0%	13.2%	23.4%	5.9%	1.5%	5505
Sucre	48.7%	15.5%	26.2%	8.1%	1.5%	7730
Tolima	56.6%	13.8%	21.9%	6.1%	1.6%	9717
Tuluá	57.2%	13.3%	22.4%	6.1%	1.0%	2129
Tumaco	42.7%	16.2%	28.0%	9.7%	3.4%	2375
Tunja	65.2%	12.0%	17.3%	5.0%	0.5%	1871
Turbo	47.1%	15.9%	25.1%	9.2%	2.6%	2122
Uribia	35.9%	18.6%	28.0%	13.2%	4.3%	1095
Valle del Cauca	56.3%	13.2%	23.1%	6.1%	1.2%	8498
Valledupar	55.5%	13.3%	23.3%	6.5%	1.4%	5289
Vichada	45.4%	13.9%	27.3%	9.1%	4.2%	779
Villavicencio	57.0%	13.6%	22.1%	6.2%	1.2%	5786
Yopal	56.5%	13.4%	22.7%	6.2%	1.3%	2008
Yumbo	55.8%	15.3%	22.9%	4.5%	1.5%	1265
Zipaquirá	63.9%	10.1%	20.8%	4.0%	1.2%	1284
Colombia	55.5%	13.9%	22.6%	6.4%	1.6%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 6.

Los niños de quinto grado votaron por Rosa, Julio, Sara, Francisco, Diego y Ana, que querían ser elegidos como representantes del curso. Los resultados de la votación fueron:

Rosa, Julio, Sara, Sara, Rosa, Francisco, Julio, Diego, Sara,
Sara, Julio, Francisco, Rosa, Sara, Sara, Sara, Julio, Rosa.

¿En cúal de las siguientes tablas aparecen los resultados de la votación?

A.

Estudiantes	Número de votos
Rosa	I I I I I I I I I
Julio	I I I
Sara	I
Francisco	I I I I
Diego	I I
Ana	I

B.

Estudiantes	Número de votos
Rosa	I I I I I I I
Julio	I I I
Sara	I I I I I I I I I
Francisco	I I I
Diego	I
Ana	

C.

Estudiantes	Número de votos
Rosa	I I I I
Julio	I I I I
Sara	I I I I I I I
Francisco	I I
Diego	I
Ana	

D.

Estudiantes	Número de votos
Rosa	I I I I
Julio	I I I I
Sara	I I I I
Francisco	I I I I
Diego	I I I I
Ana	I I I I

• Estructura

Competencia	Comunicación
Componente	Aleatorio
Afirmación	Clasificar y organizar la presentación de datos.
Nivel de desempeño	Mínimo
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	17.1%	16.2%	48.3%	16.1%	2.5%	978
Antioquia	12.8%	11.3%	63.8%	10.6%	1.5%	29373
Apartadó	11.4%	10.5%	63.1%	12.9%	2.2%	1757
Arauca	10.0%	9.4%	70.8%	8.7%	1.0%	2680
Armenia	8.6%	8.9%	72.7%	8.6%	1.2%	2580
Atlántico	13.9%	12.0%	58.9%	12.3%	2.8%	5978
Barrancabermeja	9.1%	10.0%	70.0%	9.6%	1.3%	2488
Barranquilla	9.8%	9.4%	70.5%	9.0%	1.4%	12401
Bello	8.5%	7.5%	75.1%	8.1%	0.9%	3836
Bogotá, D.C.	7.3%	7.2%	77.3%	6.9%	1.3%	66877
Bolívar	17.5%	15.5%	50.2%	14.6%	2.2%	11163
Boyacá	10.1%	8.4%	71.7%	9.1%	0.6%	9265
Bucaramanga	6.3%	6.6%	80.4%	6.0%	0.7%	5300
Buenaventura	14.9%	12.2%	59.3%	10.9%	2.7%	4160
Buga	8.2%	10.8%	71.9%	7.8%	1.3%	1238
Caldas	11.9%	9.9%	67.4%	9.7%	1.0%	5750
Cali	8.8%	8.7%	72.9%	8.2%	1.4%	19641
Caquetá	16.0%	12.6%	56.9%	13.1%	1.3%	3265
Cartagena	12.3%	11.8%	63.3%	10.8%	1.8%	11457
Cartago	8.7%	10.0%	72.1%	7.4%	1.7%	1274
Casanare	11.5%	8.6%	70.0%	8.7%	1.2%	3072
Cauca	15.6%	12.2%	56.9%	13.0%	2.3%	12628
Cesar	14.0%	12.7%	59.5%	12.6%	1.2%	8483
Chocó	17.9%	16.0%	48.0%	15.5%	2.6%	3852
Chía	7.4%	6.1%	79.9%	5.7%	1.0%	1448
Ciénaga	15.8%	14.7%	54.0%	12.0%	3.5%	1516
Cundinamarca	7.9%	7.6%	76.4%	7.2%	1.0%	16374
Córdoba	16.9%	15.7%	50.6%	15.3%	1.5%	13351
Cúcuta	8.2%	7.9%	75.6%	7.3%	1.1%	7404
Dosquebradas	8.4%	7.6%	74.6%	8.0%	1.4%	1863
Duitama	5.5%	5.9%	82.4%	5.7%	0.5%	1408
Envigado	6.1%	6.6%	79.6%	6.9%	0.7%	1415
Facatativá	5.5%	6.2%	81.3%	6.5%	0.5%	1412
Florencia	11.8%	10.2%	66.2%	10.4%	1.4%	2075
Floridablanca	5.6%	6.2%	81.2%	6.0%	1.0%	2586
Fusagasugá	7.5%	8.5%	75.8%	7.0%	1.2%	1232
Girardot	12.6%	9.3%	67.0%	8.0%	3.0%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	9.1%	8.9%	74.3%	7.0%	0.8%	1523
Guainía	19.0%	12.4%	50.9%	15.3%	2.5%	517
Guaviare	10.4%	10.9%	64.9%	12.0%	1.8%	914
Huila	11.3%	9.3%	68.9%	9.7%	0.8%	8204
Ibagué	7.3%	7.9%	76.7%	7.1%	0.9%	5546
Ipiales	6.7%	7.7%	76.9%	7.9%	0.9%	1485
Itagüí	9.7%	9.3%	69.8%	9.9%	1.3%	2028
Jamundí	12.0%	11.6%	63.7%	11.2%	1.5%	1103
La Guajira	15.8%	14.1%	53.8%	14.2%	2.1%	3931
Lorica	16.3%	13.5%	53.6%	14.5%	2.1%	1541
Magangué	15.8%	14.6%	53.5%	14.6%	1.5%	1648
Magdalena	18.1%	15.5%	50.1%	13.6%	2.7%	9172
Maicao	15.7%	13.6%	53.8%	14.7%	2.2%	2162
Malambo	12.3%	12.7%	61.7%	11.4%	1.9%	1278
Manizales	7.7%	8.2%	77.5%	5.9%	0.7%	3145
Medellín	10.7%	9.8%	68.6%	9.5%	1.4%	20621
Meta	11.5%	10.2%	66.9%	10.0%	1.4%	6012
Montería	13.1%	11.8%	62.9%	11.1%	1.2%	5509
Mosquera	5.8%	6.5%	79.5%	7.1%	1.2%	1286
Nariño	12.1%	10.4%	65.8%	10.0%	1.7%	9299
Neiva	8.3%	8.1%	74.7%	8.0%	0.9%	3661
Norte de Santander	10.4%	9.5%	70.3%	8.6%	1.1%	8026
Palmira	7.5%	6.1%	79.0%	6.4%	1.0%	2836
Pasto	7.7%	7.0%	77.4%	6.8%	1.1%	4034
Pereira	8.9%	8.3%	74.8%	7.3%	0.7%	4349
Piedecuesta	7.2%	6.4%	77.7%	7.5%	1.2%	1481
Pitalito	10.4%	10.0%	69.8%	9.2%	0.6%	1582
Popayán	9.0%	7.8%	73.6%	8.4%	1.2%	3086
Putumayo	13.1%	11.6%	63.1%	10.5%	1.7%	4142
Quibdó	14.7%	13.3%	56.9%	12.8%	2.4%	1317
Quindío	11.4%	9.4%	67.8%	9.8%	1.7%	2449
Riohacha	14.5%	14.1%	56.2%	12.7%	2.4%	2582
Rionegro	6.3%	7.1%	78.9%	6.9%	0.8%	1185
Risaralda	10.8%	10.0%	68.3%	9.8%	1.1%	2810
Sabaneta	9.4%	5.7%	77.1%	7.0%	0.8%	511
Sahagún	12.8%	11.8%	63.6%	10.4%	1.5%	1213
San Andrés	7.9%	11.0%	68.1%	11.4%	1.6%	555
Santa Marta	11.7%	10.3%	65.5%	10.9%	1.6%	5826
Santander	10.4%	8.3%	71.7%	8.9%	0.6%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	11.1%	9.9%	66.6%	11.2%	1.1%	3217
Soacha	9.1%	8.6%	73.9%	7.5%	1.0%	5620
Sogamoso	5.7%	5.1%	84.1%	4.3%	0.8%	1503
Soledad	10.3%	9.4%	69.8%	9.2%	1.4%	5505
Sucre	15.6%	14.6%	54.3%	14.1%	1.3%	7730
Tolima	12.5%	10.4%	65.4%	10.2%	1.5%	9717
Tuluá	8.6%	8.0%	75.7%	6.8%	0.8%	2129
Tumaco	19.2%	17.9%	42.4%	17.5%	3.0%	2375
Tunja	5.9%	5.8%	82.0%	5.7%	0.6%	1871
Turbo	17.9%	14.6%	49.7%	15.5%	2.4%	2122
Uribia	23.1%	18.7%	33.9%	20.8%	3.5%	1095
Valle del Cauca	11.0%	10.0%	68.2%	9.8%	1.0%	8498
Valledupar	11.9%	10.5%	67.6%	9.0%	1.1%	5289
Vichada	19.0%	14.9%	49.2%	13.2%	3.7%	779
Villavicencio	7.8%	7.6%	75.4%	8.0%	1.2%	5786
Yopal	9.0%	8.7%	72.7%	8.2%	1.4%	2008
Yumbo	9.7%	8.1%	70.3%	10.2%	1.7%	1265
Zipaquirá	8.5%	7.3%	78.4%	5.3%	0.5%	1284
Colombia	11.0%	10.0%	67.9%	9.7%	1.4%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 7.

En el calendario de abril se marcaron algunos números para realizar una actividad en clase de matemáticas.

ABRIL						
L	M	M	J	V	S	D
						1
2	3	4	5	6	7	8
9	10	11	12	13	14	15
16	17	18	19	20	21	22
23	24	25	26	27	28	29
30						

Los números marcados en el calendario son **todos** múltiplos de

A. 4
B. 8
C. 12
D. 28

• Estructura

Competencia	Comunicación
Componente	Numérico - Variacional
Afirmación	Describir e interpretar propiedades y relaciones de los números y sus operaciones.
Nivel de desempeño	Mínimo
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	54.2%	13.9%	12.2%	17.8%	1.9%	978
Antioquia	68.7%	11.1%	7.4%	11.3%	1.4%	29373
Apartadó	62.7%	12.2%	8.7%	14.2%	2.2%	1757
Arauca	71.6%	11.1%	7.1%	9.4%	0.7%	2680
Armenia	73.8%	10.8%	6.9%	7.5%	1.0%	2580
Atlántico	65.3%	10.9%	9.2%	11.6%	2.9%	5978
Barrancabermeja	75.7%	9.5%	5.9%	7.8%	1.2%	2488
Barranquilla	72.4%	11.3%	6.9%	8.3%	1.0%	12401
Bello	76.3%	9.6%	5.9%	7.3%	0.8%	3836
Bogotá, D.C.	79.9%	7.9%	5.1%	5.9%	1.1%	66877
Bolívar	57.0%	13.9%	9.8%	17.3%	2.0%	11163
Boyacá	78.3%	8.2%	5.5%	7.6%	0.5%	9265
Bucaramanga	83.4%	7.3%	4.0%	4.6%	0.6%	5300
Buenaventura	65.3%	11.1%	7.3%	13.5%	2.8%	4160
Buga	76.7%	9.0%	5.7%	7.4%	1.1%	1238
Caldas	74.9%	9.4%	6.2%	8.8%	0.8%	5750
Cali	75.0%	9.8%	6.3%	7.5%	1.3%	19641
Caquetá	64.0%	12.3%	8.7%	13.9%	1.1%	3265
Cartagena	68.0%	11.3%	7.8%	11.5%	1.4%	11457
Cartago	73.0%	11.9%	6.6%	7.0%	1.5%	1274
Casanare	73.6%	10.1%	6.8%	8.7%	0.8%	3072
Cauca	67.4%	9.6%	8.1%	12.9%	2.1%	12628
Cesar	62.1%	13.3%	9.3%	14.2%	1.0%	8483
Chocó	58.7%	11.7%	9.0%	18.4%	2.2%	3852
Chía	82.8%	7.7%	4.5%	4.2%	0.8%	1448
Ciénaga	59.6%	12.9%	9.8%	15.0%	2.8%	1516
Cundinamarca	81.0%	7.6%	4.9%	5.9%	0.7%	16374
Córdoba	56.5%	14.5%	10.5%	17.3%	1.2%	13351
Cúcuta	78.7%	9.0%	5.3%	6.3%	0.7%	7404
Dosquebradas	79.6%	8.4%	5.3%	5.6%	1.1%	1863
Duitama	86.6%	5.5%	3.7%	4.0%	0.2%	1408
Envigado	84.2%	6.5%	3.0%	5.7%	0.6%	1415
Facatativá	84.5%	7.2%	3.5%	4.5%	0.3%	1412
Florencia	69.7%	11.1%	8.2%	10.0%	1.0%	2075
Floridablanca	83.7%	6.8%	4.1%	4.8%	0.7%	2586
Fusagasugá	82.6%	6.9%	5.0%	4.5%	1.0%	1232
Girardot	71.3%	9.2%	7.2%	10.1%	2.3%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	78.7%	9.3%	5.5%	5.7%	0.8%	1523
Guainía	62.3%	13.0%	7.7%	15.1%	1.9%	517
Guaviare	66.1%	13.2%	7.2%	12.1%	1.3%	914
Huila	73.1%	9.6%	6.4%	10.3%	0.6%	8204
Ibagué	78.6%	8.0%	5.4%	7.3%	0.7%	5546
Ipiales	81.2%	7.5%	5.0%	5.8%	0.5%	1485
Itagüí	73.9%	11.2%	6.6%	7.2%	1.1%	2028
Jamundí	67.8%	12.5%	7.6%	10.7%	1.4%	1103
La Guajira	60.6%	13.2%	9.3%	15.4%	1.5%	3931
Lorica	61.7%	12.5%	8.2%	15.8%	1.8%	1541
Magangué	60.7%	13.5%	8.8%	15.7%	1.4%	1648
Magdalena	58.4%	11.8%	9.6%	17.9%	2.3%	9172
Maicao	58.3%	14.4%	9.4%	16.1%	1.8%	2162
Malambo	67.8%	11.9%	7.3%	11.8%	1.2%	1278
Manizales	83.7%	7.2%	4.1%	4.5%	0.6%	3145
Medellín	70.6%	12.1%	7.4%	8.8%	1.1%	20621
Meta	68.8%	11.1%	8.2%	11.0%	0.9%	6012
Montería	65.2%	12.5%	8.7%	12.6%	1.0%	5509
Mosquera	80.5%	7.4%	5.8%	5.4%	0.9%	1286
Nariño	74.1%	8.5%	6.1%	9.8%	1.5%	9299
Neiva	76.3%	8.5%	6.3%	8.1%	0.8%	3661
Norte de Santander	76.4%	8.2%	5.8%	8.7%	0.8%	8026
Palmira	81.3%	7.7%	4.6%	5.7%	0.7%	2836
Pasto	82.4%	6.8%	5.2%	5.0%	0.6%	4034
Pereira	78.7%	8.0%	5.5%	7.5%	0.3%	4349
Piedecuesta	84.5%	5.7%	4.0%	5.0%	0.7%	1481
Pitalito	73.5%	11.1%	6.8%	8.4%	0.3%	1582
Popayán	81.6%	7.6%	4.8%	5.1%	0.8%	3086
Putumayo	68.2%	10.9%	7.1%	12.1%	1.6%	4142
Quibdó	63.6%	11.8%	8.3%	14.5%	1.9%	1317
Quindío	70.2%	10.1%	7.4%	11.1%	1.2%	2449
Riohacha	62.7%	11.4%	10.0%	13.9%	1.9%	2582
Rionegro	82.0%	8.4%	4.6%	4.3%	0.7%	1185
Risaralda	72.9%	8.3%	6.2%	11.5%	1.1%	2810
Sabaneta	81.0%	9.2%	3.9%	5.5%	0.4%	511
Sahagún	64.4%	13.3%	8.6%	12.2%	1.6%	1213
San Andrés	65.0%	13.5%	8.6%	12.1%	0.7%	555
Santa Marta	68.7%	11.4%	7.6%	11.0%	1.3%	5826
Santander	78.9%	8.0%	5.5%	7.1%	0.5%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	68.7%	11.9%	7.9%	10.8%	0.8%	3217
Soacha	75.6%	10.1%	6.1%	7.3%	0.9%	5620
Sogamoso	86.6%	5.4%	4.5%	3.2%	0.3%	1503
Soledad	74.7%	9.9%	6.2%	8.0%	1.2%	5505
Sucre	60.2%	13.2%	9.5%	16.0%	1.0%	7730
Tolima	69.6%	9.6%	7.5%	12.0%	1.2%	9717
Tuluá	74.4%	9.5%	5.6%	9.6%	0.8%	2129
Tumaco	48.8%	16.3%	11.7%	20.0%	3.2%	2375
Tunja	84.4%	6.7%	4.0%	4.4%	0.4%	1871
Turbo	54.1%	15.8%	10.2%	17.8%	2.1%	2122
Uribia	48.7%	13.4%	10.3%	23.9%	3.7%	1095
Valle del Cauca	70.7%	10.5%	7.5%	10.4%	0.9%	8498
Valledupar	68.0%	11.2%	8.4%	11.6%	0.9%	5289
Vichada	57.0%	13.0%	9.6%	16.8%	3.6%	779
Villavicencio	77.9%	9.5%	5.2%	6.6%	0.7%	5786
Yopal	76.0%	8.8%	6.1%	8.1%	1.0%	2008
Yumbo	72.3%	10.4%	9.1%	7.2%	1.0%	1265
Zipaquirá	84.7%	5.6%	4.7%	4.7%	0.4%	1284
Colombia	72.2%	10.1%	6.8%	9.7%	1.2%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 8.

Cinco hermanos que están decorando su casa para una fiesta compraron 2 docenas de globos para colocarlos en el techo y las paredes. Mario colocó 2 globos, Lucía 5, Francisco 1, Verónica 6 y Diana 4.

¿Cuántos globos faltan por colocar?

A. 2
B. 6
C. 20
D. 24

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver problemas aditivos rutinarios y no rutinarios de transformación, comparación, combinación e igualación e interpretar condiciones necesarias para su solución.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	18.9%	41.7%	26.1%	11.5%	1.8%	978
Antioquia	18.4%	53.3%	18.0%	8.7%	1.6%	29373
Apartadó	22.9%	43.4%	21.0%	10.2%	2.4%	1757
Arauca	17.2%	55.2%	19.0%	7.4%	1.2%	2680
Armenia	22.3%	51.4%	17.2%	7.9%	1.2%	2580
Atlántico	18.5%	46.7%	21.3%	10.1%	3.3%	5978
Barrancabermeja	24.2%	47.7%	18.9%	7.6%	1.6%	2488
Barranquilla	21.5%	50.7%	18.2%	8.3%	1.3%	12401
Bello	22.6%	51.3%	16.5%	8.4%	1.2%	3836
Bogotá, D.C.	21.9%	57.5%	13.4%	6.0%	1.3%	66877
Bolívar	17.7%	43.6%	24.8%	11.5%	2.4%	11163
Boyacá	17.6%	59.6%	16.1%	6.2%	0.5%	9265
Bucaramanga	21.0%	59.1%	13.2%	5.8%	0.9%	5300
Buenaventura	18.1%	50.2%	19.7%	9.2%	2.9%	4160
Buga	21.8%	52.0%	17.4%	7.8%	1.0%	1238
Caldas	18.5%	52.9%	19.8%	7.7%	1.1%	5750
Cali	22.7%	50.9%	17.4%	7.5%	1.5%	19641
Caquetá	16.7%	51.6%	20.8%	9.6%	1.3%	3265
Cartagena	19.0%	51.1%	18.4%	9.7%	1.8%	11457
Cartago	21.2%	48.4%	20.2%	8.4%	1.8%	1274
Casanare	17.8%	56.0%	17.4%	7.7%	1.1%	3072
Cauca	15.8%	53.3%	19.3%	9.4%	2.3%	12628
Cesar	18.7%	48.5%	20.8%	10.7%	1.2%	8483
Chocó	15.3%	47.9%	23.0%	11.4%	2.3%	3852
Chía	23.4%	59.5%	10.7%	5.4%	1.0%	1448
Ciénaga	20.4%	48.1%	19.8%	8.4%	3.2%	1516
Cundinamarca	19.4%	59.1%	14.5%	6.1%	0.9%	16374
Córdoba	18.0%	45.8%	23.0%	11.7%	1.6%	13351
Cúcuta	18.0%	57.0%	16.9%	6.9%	1.1%	7404
Dosquebradas	21.3%	53.6%	16.9%	6.7%	1.5%	1863
Duitama	18.8%	64.4%	12.2%	4.2%	0.4%	1408
Envigado	19.1%	62.4%	11.9%	5.7%	1.0%	1415
Facatativá	20.4%	57.9%	14.9%	6.0%	0.7%	1412
Florencia	20.5%	49.3%	20.8%	8.4%	1.1%	2075
Floridablanca	20.8%	58.7%	13.2%	6.5%	0.8%	2586
Fusagasugá	24.4%	52.5%	15.8%	5.9%	1.3%	1232
Girardot	22.9%	48.6%	18.7%	7.2%	2.7%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	21.9%	54.0%	15.5%	7.9%	0.7%	1523
Guainía	21.3%	40.8%	25.9%	9.7%	2.3%	517
Guaviare	17.1%	54.8%	19.6%	6.9%	1.6%	914
Huila	20.1%	50.2%	20.8%	8.0%	0.9%	8204
Ibagué	20.2%	57.1%	15.5%	6.4%	0.8%	5546
Ipiales	13.1%	63.3%	16.4%	6.5%	0.7%	1485
Itagüí	22.3%	53.5%	16.4%	6.4%	1.3%	2028
Jamundí	22.0%	46.4%	20.9%	9.1%	1.5%	1103
La Guajira	17.5%	44.7%	24.2%	11.3%	2.2%	3931
Lorica	16.8%	49.1%	20.2%	12.0%	1.8%	1541
Magangué	18.3%	43.0%	26.3%	10.7%	1.8%	1648
Magdalena	18.3%	45.2%	22.6%	11.1%	2.8%	9172
Maicao	18.4%	46.2%	23.5%	10.1%	1.8%	2162
Malambo	17.0%	53.4%	17.8%	10.2%	1.6%	1278
Manizales	19.2%	59.1%	14.5%	6.5%	0.7%	3145
Medellín	21.3%	50.5%	18.4%	8.5%	1.3%	20621
Meta	18.7%	51.9%	19.4%	8.8%	1.1%	6012
Montería	21.0%	47.8%	21.1%	8.9%	1.2%	5509
Mosquera	26.7%	54.4%	11.8%	5.9%	1.2%	1286
Nariño	15.2%	59.8%	15.6%	7.5%	1.9%	9299
Neiva	22.9%	48.8%	20.0%	7.4%	0.9%	3661
Norte de Santander	14.9%	60.9%	16.5%	6.9%	0.9%	8026
Palmira	21.5%	53.9%	16.3%	7.4%	0.8%	2836
Pasto	18.4%	60.0%	15.9%	5.0%	0.7%	4034
Pereira	23.6%	52.3%	16.9%	6.6%	0.6%	4349
Piedecuesta	24.0%	54.2%	15.4%	5.6%	0.9%	1481
Pitalito	22.3%	49.4%	20.2%	7.7%	0.4%	1582
Popayán	20.0%	56.9%	15.7%	6.4%	1.0%	3086
Putumayo	16.1%	53.0%	21.1%	8.1%	1.7%	4142
Quibdó	20.9%	46.0%	21.3%	9.3%	2.4%	1317
Quindío	22.4%	47.8%	19.2%	8.9%	1.7%	2449
Riohacha	18.4%	46.2%	24.1%	8.8%	2.5%	2582
Rionegro	21.3%	59.2%	11.5%	7.3%	0.8%	1185
Risaralda	18.7%	51.6%	20.4%	7.9%	1.3%	2810
Sabaneta	18.4%	58.5%	17.8%	4.9%	0.4%	511
Sahagún	22.8%	43.7%	22.8%	8.8%	1.8%	1213
San Andrés	19.1%	48.3%	21.1%	10.3%	1.3%	555
Santa Marta	21.9%	48.2%	20.5%	7.9%	1.4%	5826
Santander	19.2%	56.5%	16.6%	7.0%	0.7%	8664

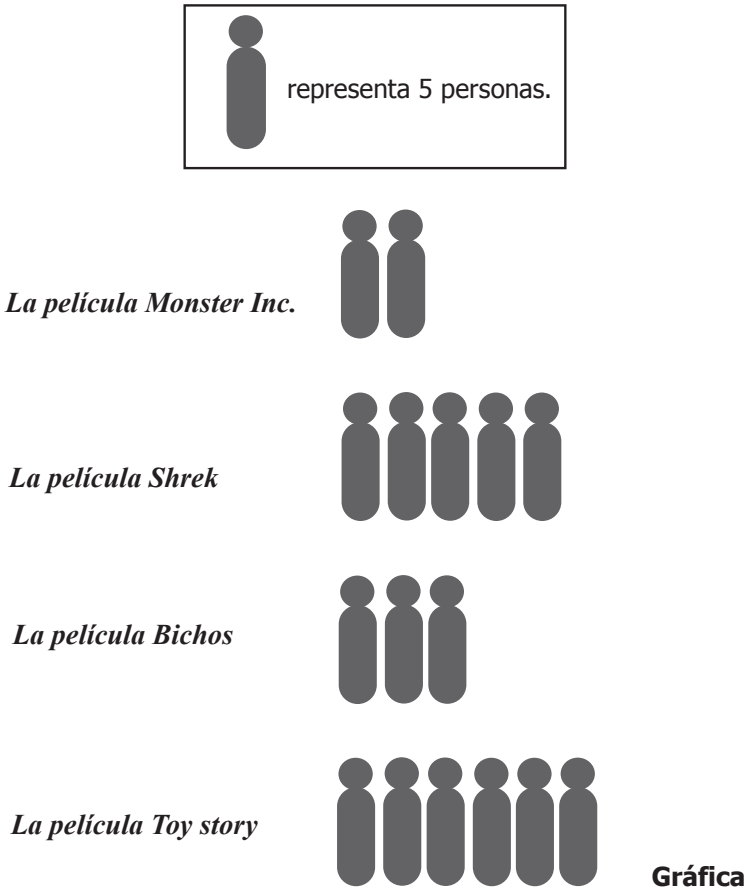
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	22.2%	48.2%	20.4%	8.0%	1.2%	3217
Soacha	22.2%	52.6%	17.2%	6.9%	1.1%	5620
Sogamoso	22.8%	61.1%	11.4%	4.4%	0.4%	1503
Soledad	22.4%	50.7%	18.0%	7.7%	1.3%	5505
Sucre	18.8%	44.3%	24.4%	11.3%	1.3%	7730
Tolima	17.3%	53.6%	19.6%	8.0%	1.5%	9717
Tuluá	20.3%	54.0%	17.5%	7.1%	1.1%	2129
Tumaco	17.0%	40.8%	24.9%	13.6%	3.6%	2375
Tunja	21.3%	60.8%	11.5%	5.8%	0.5%	1871
Turbo	20.2%	41.6%	25.0%	10.7%	2.5%	2122
Uribia	16.1%	43.8%	23.8%	13.1%	3.2%	1095
Valle del Cauca	18.4%	52.8%	19.3%	8.4%	1.1%	8498
Valledupar	20.6%	49.7%	19.9%	8.8%	1.0%	5289
Vichada	18.5%	45.4%	22.2%	10.7%	3.2%	779
Villavicencio	21.9%	54.7%	15.6%	6.8%	1.0%	5786
Yopal	24.8%	51.7%	15.9%	6.4%	1.1%	2008
Yumbo	24.3%	47.0%	20.0%	7.5%	1.3%	1265
Zipaquirá	21.0%	61.0%	10.9%	6.4%	0.8%	1284
Colombia	19.8%	52.8%	18.0%	8.0%	1.4%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

- **Pregunta 9.**

En una encuesta se le preguntó a un grupo de niños por su película favorita. En la gráfica se muestran los resultados.



Gráfica

¿Cuántos niños, en total, respondieron la pregunta?

A. 80
B. 20
C. 5
D. 4

• Estructura

Competencia	Comunicación
Componente	Numérico - variacional
Afirmación	Reconocer e interpretar números naturales y fracciones en diferentes contextos.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	26.4%	21.7%	35.5%	14.0%	2.5%	978
Antioquia	42.1%	19.3%	27.2%	9.6%	1.8%	29373
Apartadó	37.9%	19.3%	29.8%	10.4%	2.7%	1757
Arauca	48.0%	15.9%	26.0%	8.6%	1.5%	2680
Armenia	49.8%	21.5%	20.0%	7.3%	1.4%	2580
Atlántico	40.3%	18.1%	27.7%	10.4%	3.4%	5978
Barrancabermeja	47.4%	17.6%	25.6%	7.7%	1.6%	2488
Barranquilla	47.7%	19.0%	23.1%	8.6%	1.5%	12401
Bello	50.6%	19.3%	21.6%	7.0%	1.5%	3836
Bogotá, D.C.	57.0%	17.1%	18.9%	5.5%	1.4%	66877
Bolívar	31.3%	19.5%	33.6%	12.9%	2.7%	11163
Boyacá	53.9%	15.6%	23.0%	6.8%	0.7%	9265
Bucaramanga	62.8%	14.4%	16.4%	5.5%	0.8%	5300
Buenaventura	39.5%	18.4%	27.7%	11.1%	3.3%	4160
Buga	45.5%	21.2%	24.0%	8.0%	1.3%	1238
Caldas	44.4%	19.0%	26.5%	9.0%	1.1%	5750
Cali	51.7%	18.7%	20.7%	7.3%	1.6%	19641
Caquetá	38.5%	17.3%	31.4%	11.2%	1.6%	3265
Cartagena	42.4%	19.4%	26.3%	9.9%	2.0%	11457
Cartago	47.8%	21.1%	21.6%	7.6%	1.9%	1274
Casanare	46.6%	16.9%	26.7%	8.4%	1.4%	3072
Cauca	42.4%	15.1%	29.5%	10.5%	2.5%	12628
Cesar	35.5%	19.1%	32.3%	11.5%	1.5%	8483
Chocó	35.2%	16.7%	34.0%	11.3%	2.9%	3852
Chía	58.0%	15.5%	19.2%	6.3%	1.0%	1448

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Ciénaga	38.7%	16.9%	30.7%	11.0%	2.7%	1516
Cundinamarca	55.9%	15.9%	20.4%	6.6%	1.1%	16374
Córdoba	32.5%	20.9%	32.6%	12.1%	2.0%	13351
Cúcuta	50.3%	17.4%	23.6%	7.7%	1.1%	7404
Dosquebradas	47.0%	21.0%	22.5%	7.7%	1.8%	1863
Duitama	68.9%	12.1%	14.3%	4.1%	0.6%	1408
Envigado	63.1%	15.8%	14.0%	6.1%	1.1%	1415
Facatativá	57.9%	18.1%	17.6%	5.9%	0.5%	1412
Florencia	40.1%	20.6%	27.1%	10.3%	1.9%	2075
Floridablanca	61.6%	15.5%	16.0%	5.9%	1.0%	2586
Fusagasugá	56.9%	17.2%	18.4%	6.3%	1.2%	1232
Girardot	42.7%	19.1%	27.7%	7.0%	3.5%	895
Girón	50.5%	19.5%	21.8%	7.3%	0.9%	1523
Guainía	27.5%	19.0%	38.5%	11.2%	3.9%	517
Guaviare	37.3%	19.4%	31.7%	10.0%	1.6%	914
Huila	45.7%	16.9%	27.2%	9.4%	0.8%	8204
Ibagué	55.5%	17.2%	19.5%	6.9%	0.9%	5546
Ipiales	58.0%	14.5%	19.1%	7.5%	0.9%	1485
Itagüí	50.4%	21.4%	19.5%	7.4%	1.3%	2028
Jamundí	42.0%	21.5%	24.8%	10.1%	1.7%	1103
La Guajira	38.2%	18.4%	30.2%	10.6%	2.6%	3931
Lorica	38.3%	19.1%	29.1%	10.8%	2.6%	1541
Magangué	31.9%	21.0%	32.4%	12.7%	2.0%	1648
Magdalena	35.1%	18.0%	32.4%	11.5%	3.1%	9172
Maicao	34.1%	20.8%	30.2%	12.9%	2.0%	2162
Malambo	47.0%	16.7%	25.7%	8.7%	2.0%	1278
Manizales	56.5%	17.7%	18.9%	6.0%	0.8%	3145
Medellín	44.8%	22.6%	22.8%	8.0%	1.7%	20621
Meta	42.2%	18.8%	28.8%	8.9%	1.3%	6012
Montería	38.6%	21.9%	28.3%	9.8%	1.4%	5509
Mosquera	53.9%	17.1%	20.8%	6.8%	1.4%	1286
Nariño	50.5%	14.5%	23.8%	9.3%	1.9%	9299
Neiva	49.4%	19.5%	22.5%	7.6%	1.0%	3661
Norte de Santander	48.3%	16.2%	25.7%	8.6%	1.1%	8026
Palmira	57.3%	17.5%	17.7%	6.6%	0.9%	2836
Pasto	64.0%	14.1%	15.1%	5.9%	0.9%	4034
Pereira	50.0%	19.7%	22.6%	6.7%	1.0%	4349
Piedecuesta	58.5%	15.6%	18.6%	6.3%	0.9%	1481

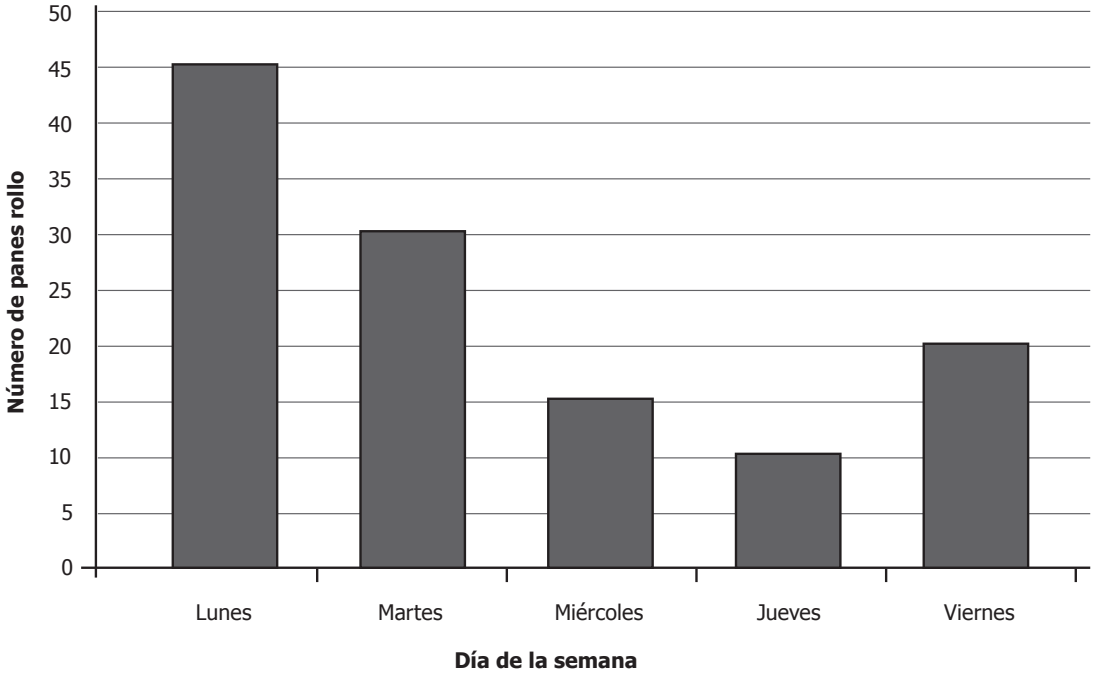
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Pitalito	47.1%	17.9%	25.2%	9.0%	0.8%	1582
Popayán	54.8%	16.3%	20.8%	7.0%	1.2%	3086
Putumayo	44.7%	16.3%	28.5%	8.5%	2.0%	4142
Quibdó	38.6%	16.8%	27.7%	14.3%	2.6%	1317
Quindío	45.3%	20.3%	24.6%	8.0%	1.8%	2449
Riohacha	35.5%	18.9%	30.4%	12.7%	2.6%	2582
Rionegro	66.8%	14.3%	14.0%	4.0%	0.9%	1185
Risaralda	44.6%	18.6%	27.0%	8.3%	1.5%	2810
Sabaneta	57.3%	18.4%	17.4%	6.1%	0.8%	511
Sahagún	39.5%	21.8%	26.5%	10.5%	1.7%	1213
San Andrés	35.5%	23.2%	28.1%	11.5%	1.6%	555
Santa Marta	41.1%	20.1%	27.4%	9.7%	1.7%	5826
Santander	52.5%	15.7%	23.2%	7.6%	1.0%	8664
Sincelejo	46.4%	19.6%	23.8%	8.9%	1.2%	3217
Soacha	47.1%	21.5%	23.2%	7.0%	1.3%	5620
Sogamoso	65.3%	15.4%	13.7%	5.1%	0.6%	1503
Soledad	51.4%	17.2%	22.3%	7.8%	1.3%	5505
Sucre	35.8%	19.7%	31.2%	11.8%	1.5%	7730
Tolima	44.3%	17.2%	27.9%	9.1%	1.5%	9717
Tuluá	47.4%	20.2%	22.8%	8.2%	1.5%	2129
Tumaco	24.6%	20.0%	37.9%	13.5%	4.0%	2375
Tunja	66.2%	12.7%	16.0%	4.6%	0.4%	1871
Turbo	26.7%	22.0%	35.3%	13.9%	2.2%	2122
Uribia	25.7%	19.5%	35.4%	16.0%	3.4%	1095
Valle del Cauca	45.7%	18.4%	25.3%	9.3%	1.3%	8498
Valledupar	43.3%	18.5%	27.3%	9.6%	1.4%	5289
Vichada	31.2%	17.8%	35.3%	11.6%	4.1%	779
Villavicencio	50.9%	17.9%	22.6%	7.5%	1.2%	5786
Yopal	48.8%	19.2%	22.6%	8.3%	1.2%	2008
Yumbo	46.7%	18.4%	25.5%	8.3%	1.1%	1265
Zipaquirá	58.6%	15.0%	19.6%	6.1%	0.6%	1284
Colombia	47.1%	18.2%	24.6%	8.5%	1.6%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 10.

La gráfica muestra el número de panes rollo y la tabla, el número de panes blanditos vendidos en una panadería entre el lunes y el viernes de la semana pasada.



Gráfica

Día	Número de panes blanditos
Lunes	26
Martes	32
Miércoles	15
Jueves	11
Viernes	13

Tabla

¿Cuál de las siguientes afirmaciones es verdadera?

A. El Lunes se vendieron menos panes rollo que cualquier otro día.

B. El Jueves se vendieron más panes blanditos que cualquier otro día.

C. El Viernes se vendieron 13 panes rollo y 20 panes blanditos.

D. El Martes se vendieron 30 panes rollo y 32 panes blanditos.

• Estructura

Competencia	Razonamiento
Componente	Aleatorio
Afirmación	Hacer inferencias a partir de representaciones de uno o más conjuntos de datos.
Nivel de desempeño	Mínimo
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	15.3%	13.4%	20.1%	48.6%	2.6%	978
Antioquia	12.9%	12.8%	19.7%	52.5%	2.0%	29373
Apartadó	13.8%	13.4%	20.2%	49.7%	2.9%	1757
Arauca	11.8%	12.2%	19.2%	55.5%	1.3%	2680
Armenia	12.8%	13.1%	20.1%	52.3%	1.6%	2580
Atlántico	13.7%	14.0%	18.5%	50.3%	3.6%	5978
Barrancabermeja	13.2%	11.2%	18.5%	55.3%	1.8%	2488
Barranquilla	13.6%	12.2%	18.4%	54.1%	1.8%	12401
Bello	12.9%	11.4%	19.2%	54.2%	2.4%	3836
Bogotá, D.C.	11.2%	10.3%	17.8%	59.0%	1.7%	66877
Bolívar	14.3%	14.5%	20.6%	47.5%	3.1%	11163
Boyacá	11.7%	11.0%	18.1%	58.4%	0.9%	9265
Bucaramanga	10.7%	9.5%	17.7%	61.0%	1.2%	5300
Buenaventura	13.9%	11.6%	17.8%	52.9%	3.7%	4160
Buga	12.7%	12.0%	20.4%	53.3%	1.7%	1238
Caldas	12.6%	11.9%	19.2%	54.9%	1.3%	5750
Cali	12.5%	10.8%	18.5%	56.4%	1.8%	19641
Caquetá	14.8%	14.2%	17.8%	51.1%	2.0%	3265
Cartagena	14.5%	13.1%	18.2%	51.9%	2.3%	11457
Cartago	14.1%	10.6%	20.2%	52.9%	2.3%	1274
Casanare	13.2%	12.1%	17.8%	55.4%	1.5%	3072
Cauca	13.3%	11.9%	18.2%	53.7%	2.9%	12628
Cesar	13.6%	12.9%	18.5%	53.3%	1.7%	8483
Chocó	16.2%	13.6%	17.8%	49.5%	2.9%	3852
Chía	10.6%	8.8%	17.8%	61.9%	0.9%	1448

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Ciénaga	14.5%	12.2%	17.9%	51.9%	3.4%	1516
Cundinamarca	11.3%	10.6%	17.2%	59.8%	1.1%	16374
Córdoba	15.3%	15.3%	19.7%	47.7%	2.0%	13351
Cúcuta	11.6%	11.9%	18.3%	56.8%	1.3%	7404
Dosquebradas	12.4%	12.7%	19.9%	53.2%	1.8%	1863
Duitama	7.5%	9.8%	16.1%	66.3%	0.4%	1408
Envigado	11.0%	9.8%	17.0%	61.0%	1.2%	1415
Facatativá	10.0%	9.3%	19.1%	60.6%	1.0%	1412
Florencia	14.0%	13.0%	19.1%	52.4%	1.5%	2075
Floridablanca	11.1%	10.2%	16.0%	61.7%	1.0%	2586
Fusagasugá	12.5%	11.5%	19.9%	54.6%	1.5%	1232
Girardot	14.3%	13.9%	17.1%	51.7%	3.0%	895
Girón	12.2%	12.0%	19.2%	55.7%	0.9%	1523
Guainía	17.2%	13.5%	17.6%	48.0%	3.7%	517
Guaviare	13.9%	12.6%	21.2%	51.0%	1.3%	914
Huila	12.8%	11.9%	18.6%	55.7%	1.0%	8204
Ibagué	11.5%	10.6%	17.3%	59.4%	1.2%	5546
Ipiales	12.2%	11.6%	19.2%	56.0%	1.0%	1485
Itagüí	14.2%	13.8%	21.3%	48.9%	1.8%	2028
Jamundí	13.7%	14.0%	16.4%	54.2%	1.7%	1103
La Guajira	14.1%	13.4%	18.1%	51.6%	2.8%	3931
Lorica	13.8%	13.7%	20.1%	49.3%	3.1%	1541
Magangué	14.6%	14.3%	20.0%	49.6%	1.5%	1648
Magdalena	14.4%	14.2%	18.3%	50.0%	3.1%	9172
Maicao	15.4%	14.6%	19.9%	47.7%	2.4%	2162
Malambo	12.8%	12.8%	17.5%	54.6%	2.3%	1278
Manizales	12.6%	10.2%	20.1%	56.2%	0.9%	3145
Medellín	14.2%	13.5%	21.2%	49.2%	1.8%	20621
Meta	14.3%	12.6%	18.9%	52.5%	1.7%	6012
Montería	13.6%	14.5%	19.8%	50.5%	1.6%	5509
Mosquera	12.1%	10.3%	15.9%	60.2%	1.6%	1286
Nariño	11.7%	10.2%	18.8%	57.3%	2.0%	9299
Neiva	13.1%	11.3%	18.3%	56.0%	1.2%	3661
Norte de Santander	11.4%	11.4%	18.1%	58.0%	1.1%	8026
Palmira	10.7%	10.0%	15.8%	62.1%	1.3%	2836
Pasto	11.7%	10.4%	19.6%	57.5%	0.8%	4034
Pereira	12.7%	11.7%	19.1%	55.2%	1.2%	4349
Piedecuesta	10.0%	10.9%	17.5%	60.5%	1.1%	1481
Pitalito	15.3%	12.1%	19.2%	52.6%	0.9%	1582

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Popayán	12.3%	10.1%	17.5%	58.5%	1.6%	3086
Putumayo	13.2%	13.9%	19.1%	51.8%	2.0%	4142
Quibdó	13.7%	13.0%	16.5%	54.4%	2.4%	1317
Quindío	13.0%	12.4%	20.9%	51.7%	2.0%	2449
Riohacha	16.1%	13.9%	20.2%	46.9%	2.9%	2582
Rionegro	11.0%	11.9%	21.1%	54.5%	1.5%	1185
Risaralda	12.0%	11.9%	20.3%	54.1%	1.6%	2810
Sabaneta	11.4%	12.9%	19.2%	55.6%	1.0%	511
Sahagún	13.2%	14.2%	18.9%	51.0%	2.7%	1213
San Andrés	14.8%	13.0%	20.5%	50.5%	1.3%	555
Santa Marta	14.5%	12.3%	19.2%	51.6%	2.4%	5826
Santander	10.8%	10.5%	17.3%	60.5%	0.9%	8664
Sincelejo	13.9%	13.1%	19.4%	52.4%	1.2%	3217
Soacha	11.6%	11.0%	19.5%	56.3%	1.5%	5620
Sogamoso	10.9%	10.4%	18.4%	59.5%	0.8%	1503
Soledad	13.4%	11.2%	18.7%	55.0%	1.7%	5505
Sucre	15.1%	13.6%	19.3%	50.2%	1.8%	7730
Tolima	13.0%	11.8%	18.2%	55.1%	1.8%	9717
Tuluá	13.0%	11.7%	19.0%	55.0%	1.3%	2129
Tumaco	16.6%	17.6%	18.8%	42.3%	4.7%	2375
Tunja	10.0%	9.8%	16.7%	62.7%	0.8%	1871
Turbo	15.8%	15.4%	21.0%	45.0%	2.9%	2122
Uribia	16.6%	14.9%	20.4%	44.3%	3.8%	1095
Valle del Cauca	12.9%	11.7%	19.8%	54.0%	1.5%	8498
Valledupar	13.3%	11.3%	17.2%	57.0%	1.2%	5289
Vichada	15.0%	14.1%	18.4%	48.7%	3.9%	779
Villavicencio	12.2%	11.3%	18.3%	56.2%	2.0%	5786
Yopal	12.5%	12.9%	19.1%	54.2%	1.3%	2008
Yumbo	14.2%	9.9%	19.1%	54.9%	1.8%	1265
Zipaquirá	11.1%	8.7%	18.9%	60.1%	1.1%	1284
Colombia	12.8%	12.0%	18.7%	54.7%	1.8%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 11.

En una fábrica de lápices, 10 lápices se empacan en una bolsa, 10 bolsas se empacan en una caja pequeña y 10 cajas pequeñas se empacan en una caja grande.

¿En la fábrica, cómo pueden empacar 4.372 lápices?

A. 2 cajas grandes, 3 cajas pequeñas, 7 bolsas y 4 lápices sueltos.
B. 4 cajas pequeñas, 7 cajas grandes, 3 bolsas y 2 lápices sueltos.
C. 2 cajas pequeñas, 7 cajas grandes, 3 bolsas y 4 lápices sueltos
D. 4 cajas grandes, 3 cajas pequeñas, 7 bolsas y 2 lápices sueltos.

• Estructura

Competencia	Razonamiento
Componente	Numérico - variacional
Afirmación	Usar y justificar propiedades (aditiva y posicional) del sistema de numeración decimal.
Nivel de desempeño	Avanzado
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	16.6%	27.4%	21.3%	31.6%	3.2%	978
Antioquia	17.5%	24.7%	20.3%	35.0%	2.5%	29373
Apartadó	16.1%	24.9%	21.7%	34.1%	3.2%	1757
Arauca	15.8%	24.6%	20.8%	37.0%	1.8%	2680
Armenia	16.7%	27.1%	21.8%	32.4%	2.1%	2580
Atlántico	16.7%	24.5%	21.4%	33.6%	3.8%	5978
Barrancabermeja	15.9%	26.1%	20.5%	35.3%	2.2%	2488
Barranquilla	17.6%	25.4%	20.5%	34.5%	2.0%	12401
Bello	18.1%	25.4%	19.9%	34.1%	2.5%	3836
Bogotá, D.C.	15.9%	25.4%	19.5%	37.1%	2.1%	66877
Bolívar	18.6%	25.7%	21.8%	30.7%	3.3%	11163
Boyacá	15.0%	26.5%	20.1%	37.2%	1.1%	9265
Bucaramanga	15.3%	26.0%	18.7%	38.4%	1.5%	5300
Buenaventura	15.5%	23.8%	18.5%	38.2%	4.0%	4160
Buga	17.4%	26.9%	18.1%	36.2%	1.5%	1238
Caldas	16.2%	24.9%	19.8%	37.5%	1.6%	5750
Cali	16.6%	25.4%	19.2%	36.4%	2.5%	19641
Caquetá	15.7%	24.7%	21.6%	36.0%	2.1%	3265
Cartagena	17.3%	23.7%	19.8%	36.7%	2.6%	11457
Cartago	17.6%	23.3%	19.9%	37.1%	2.1%	1274
Casanare	16.6%	26.2%	21.0%	34.8%	1.4%	3072
Cauca	14.5%	22.6%	18.9%	40.9%	3.2%	12628
Cesar	16.2%	24.6%	20.7%	36.6%	1.8%	8483
Chocó	15.3%	24.0%	20.7%	37.0%	3.0%	3852
Chía	15.2%	24.9%	20.4%	37.8%	1.7%	1448
Ciénaga	16.2%	22.4%	20.3%	37.7%	3.6%	1516
Cundinamarca	15.1%	24.4%	19.9%	39.2%	1.5%	16374
Córdoba	17.5%	25.3%	22.9%	32.0%	2.3%	13351
Cúcuta	16.5%	26.1%	20.0%	35.8%	1.6%	7404
Dosquebradas	17.8%	26.9%	20.7%	32.4%	2.3%	1863
Duitama	16.2%	22.4%	19.4%	41.1%	0.9%	1408
Envigado	16.1%	25.2%	19.3%	37.6%	1.8%	1415
Facatativá	16.1%	25.4%	19.4%	37.8%	1.3%	1412
Florencia	17.7%	27.3%	21.0%	32.3%	1.7%	2075
Floridablanca	15.2%	25.7%	20.3%	37.3%	1.6%	2586
Fusagasugá	15.7%	24.2%	20.0%	38.2%	1.9%	1232
Girardot	16.2%	27.7%	18.7%	33.5%	3.9%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	16.9%	31.3%	19.4%	30.8%	1.6%	1523
Guainía	13.5%	26.5%	23.2%	33.8%	2.9%	517
Guaviare	18.4%	24.2%	22.6%	33.2%	1.6%	914
Huila	15.0%	25.2%	19.7%	38.7%	1.4%	8204
Ibagué	15.0%	24.2%	20.1%	39.1%	1.7%	5546
Ipiales	14.1%	24.5%	19.3%	40.3%	1.9%	1485
Itagüí	19.0%	26.2%	19.9%	32.5%	2.5%	2028
Jamundí	17.5%	27.2%	22.0%	30.9%	2.4%	1103
La Guajira	16.3%	24.3%	20.7%	36.0%	2.8%	3931
Lorica	16.6%	25.9%	19.3%	35.4%	2.9%	1541
Magangué	17.7%	26.2%	23.4%	30.7%	2.1%	1648
Magdalena	16.5%	23.8%	21.4%	34.9%	3.4%	9172
Maicao	18.8%	24.5%	23.5%	30.6%	2.7%	2162
Malambo	16.4%	21.9%	18.3%	40.8%	2.7%	1278
Manizales	15.8%	27.5%	19.6%	36.1%	1.0%	3145
Medellín	19.1%	27.3%	21.6%	30.0%	2.0%	20621
Meta	17.1%	26.0%	20.9%	34.3%	1.8%	6012
Montería	18.4%	24.8%	21.9%	33.1%	1.9%	5509
Mosquera	15.0%	25.4%	20.3%	37.0%	2.3%	1286
Nariño	13.7%	21.6%	18.6%	43.7%	2.4%	9299
Neiva	17.5%	26.6%	19.9%	34.5%	1.5%	3661
Norte de Santander	14.1%	24.3%	19.0%	41.0%	1.6%	8026
Palmira	16.0%	25.9%	17.9%	38.7%	1.4%	2836
Pasto	15.3%	25.7%	19.3%	38.3%	1.4%	4034
Pereira	16.8%	26.4%	20.5%	34.6%	1.7%	4349
Piedecuesta	15.6%	26.5%	20.1%	36.3%	1.5%	1481
Pitalito	15.9%	26.2%	21.5%	35.2%	1.2%	1582
Popayán	14.4%	25.1%	17.4%	40.6%	2.5%	3086
Putumayo	16.8%	25.3%	21.9%	33.8%	2.2%	4142
Quibdó	16.2%	22.9%	22.1%	36.1%	2.7%	1317
Quindío	17.0%	27.0%	20.8%	33.1%	2.0%	2449
Riohacha	19.6%	24.4%	20.7%	31.9%	3.4%	2582
Rionegro	16.2%	29.3%	20.9%	32.2%	1.4%	1185
Risaralda	15.4%	23.8%	21.7%	36.8%	2.2%	2810
Sabaneta	14.5%	28.4%	18.8%	36.8%	1.6%	511
Sahagún	16.6%	26.4%	23.3%	31.4%	2.3%	1213
San Andrés	21.1%	28.3%	22.5%	26.5%	1.6%	555
Santa Marta	16.8%	26.6%	20.8%	33.3%	2.5%	5826
Santander	14.6%	24.1%	20.0%	40.0%	1.3%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	17.8%	25.2%	21.9%	33.4%	1.6%	3217
Soacha	17.2%	26.3%	20.8%	33.8%	1.9%	5620
Sogamoso	16.4%	27.6%	19.5%	35.7%	0.8%	1503
Soledad	16.5%	24.6%	19.0%	38.0%	1.9%	5505
Sucre	17.7%	25.3%	22.9%	32.2%	2.0%	7730
Tolima	15.4%	23.5%	20.0%	39.3%	1.9%	9717
Tuluá	17.5%	24.8%	19.2%	37.3%	1.3%	2129
Tumaco	17.8%	24.3%	22.5%	30.7%	4.7%	2375
Tunja	14.3%	25.3%	19.4%	39.6%	1.4%	1871
Turbo	18.9%	24.2%	23.2%	30.6%	3.1%	2122
Uribia	17.5%	25.0%	21.2%	30.9%	5.4%	1095
Valle del Cauca	16.5%	25.2%	19.6%	36.9%	1.8%	8498
Valledupar	17.5%	24.1%	17.5%	39.4%	1.5%	5289
Vichada	15.0%	26.3%	19.9%	35.0%	3.7%	779
Villavicencio	16.3%	25.5%	20.3%	35.6%	2.3%	5786
Yopal	17.0%	26.2%	21.4%	33.4%	2.1%	2008
Yumbo	16.4%	29.2%	19.3%	32.6%	2.6%	1265
Zipaquirá	15.1%	24.9%	19.2%	39.8%	0.9%	1284
Colombia	16.5%	25.1%	20.2%	36.0%	2.1%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 12.

Lucy observa el siguiente paquete de arroz en el supermercado.

La información "1 kilogramo de arroz" indica

A. volumen.
B. superficie.
C. duración.
D. masa.

• Estructura

Competencia	Comunicación
Componente	Espacial - métrico
Afirmación	Establecer relaciones entre los atributos mesurables de un objeto o evento y sus respectivas magnitudes.
Nivel de desempeño	Avanzado
Respuesta Correcta	D

- **Resultados a nivel de Entidad Territorial certificada (ETC)**

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	27.3%	18.1%	23.1%	30.0%	1.5%	978
Antioquia	38.7%	13.1%	15.7%	30.9%	1.6%	29373
Apartadó	36.1%	13.4%	17.9%	30.3%	2.3%	1757
Arauca	33.5%	12.6%	15.4%	37.6%	0.8%	2680
Armenia	40.5%	12.6%	13.8%	31.7%	1.4%	2580
Atlántico	33.4%	13.9%	14.6%	35.2%	2.8%	5978
Barrancabermeja	34.8%	12.2%	13.2%	38.3%	1.5%	2488
Barranquilla	34.1%	12.8%	14.4%	37.3%	1.3%	12401
Bello	36.8%	11.9%	13.9%	35.5%	2.0%	3836
Bogotá, D.C.	31.1%	10.8%	10.9%	45.8%	1.4%	66877
Bolívar	33.1%	15.5%	18.5%	30.7%	2.2%	11163
Boyacá	36.5%	12.2%	9.6%	41.2%	0.4%	9265
Bucaramanga	33.7%	10.2%	9.3%	45.9%	0.9%	5300
Buenaventura	33.6%	14.0%	19.4%	30.0%	3.0%	4160
Buga	35.9%	11.7%	14.9%	35.9%	1.6%	1238
Caldas	37.1%	13.5%	17.9%	30.6%	0.9%	5750
Cali	36.0%	12.3%	13.7%	36.6%	1.4%	19641
Caquetá	37.9%	14.2%	16.9%	29.7%	1.3%	3265
Cartagena	31.0%	13.5%	15.2%	38.5%	1.8%	11457
Cartago	36.6%	13.4%	13.5%	34.6%	1.9%	1274
Casanare	32.6%	12.3%	13.4%	40.7%	1.0%	3072
Cauca	31.5%	13.4%	20.2%	32.7%	2.2%	12628
Cesar	33.6%	12.5%	16.7%	35.8%	1.4%	8483
Chocó	34.5%	15.9%	21.3%	25.7%	2.6%	3852
Chía	30.2%	8.4%	8.8%	51.8%	0.8%	1448
Ciénaga	29.4%	14.6%	17.2%	35.4%	3.5%	1516
Cundinamarca	33.4%	11.3%	11.0%	43.4%	0.9%	16374
Córdoba	34.1%	15.4%	18.4%	30.6%	1.5%	13351
Cúcuta	35.7%	11.5%	12.7%	39.1%	0.9%	7404
Dosquebradas	36.3%	12.1%	13.8%	36.4%	1.3%	1863
Duitama	31.0%	9.2%	6.9%	52.5%	0.4%	1408
Envigado	38.4%	9.7%	7.1%	43.8%	0.9%	1415
Facatativá	31.8%	11.3%	11.0%	45.3%	0.6%	1412
Florencia	34.7%	15.6%	16.1%	32.6%	1.1%	2075
Floridablanca	31.2%	9.6%	9.0%	49.3%	0.9%	2586
Fusagasugá	36.4%	9.7%	9.8%	42.9%	1.3%	1232
Girardot	35.9%	13.0%	12.6%	35.8%	2.8%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	35.5%	12.7%	12.7%	38.5%	0.6%	1523
Guainía	32.3%	13.2%	17.0%	34.8%	2.7%	517
Guaviare	38.7%	11.5%	16.2%	32.1%	1.5%	914
Huila	36.2%	13.0%	14.8%	35.4%	0.6%	8204
Ibagué	31.6%	11.4%	11.2%	45.0%	0.9%	5546
Ipiales	32.2%	11.5%	12.2%	43.3%	0.8%	1485
Itagüí	38.7%	14.7%	11.7%	33.2%	1.6%	2028
Jamundí	43.5%	13.7%	16.0%	25.6%	1.3%	1103
La Guajira	30.9%	15.8%	16.7%	34.5%	2.1%	3931
Lorica	34.1%	13.4%	17.2%	33.2%	2.1%	1541
Magangué	33.5%	15.8%	18.6%	30.6%	1.5%	1648
Magdalena	32.8%	14.5%	18.4%	31.8%	2.5%	9172
Maicao	32.1%	16.2%	18.8%	31.2%	1.8%	2162
Malambo	30.9%	11.4%	16.3%	40.2%	1.2%	1278
Manizales	38.7%	10.7%	13.4%	36.1%	1.1%	3145
Medellín	37.8%	13.6%	14.1%	33.2%	1.4%	20621
Meta	35.9%	13.3%	14.0%	35.3%	1.4%	6012
Montería	35.4%	13.9%	14.5%	35.1%	1.1%	5509
Mosquera	32.9%	12.9%	10.3%	42.5%	1.4%	1286
Nariño	32.8%	10.9%	14.5%	40.2%	1.6%	9299
Neiva	37.0%	11.8%	10.2%	40.1%	0.9%	3661
Norte de Santander	34.6%	12.2%	13.6%	38.6%	1.0%	8026
Palmira	40.0%	10.1%	9.7%	39.3%	0.9%	2836
Pasto	33.2%	11.3%	12.4%	42.5%	0.7%	4034
Pereira	35.3%	12.3%	15.4%	36.0%	1.0%	4349
Piedecuesta	32.7%	12.0%	10.8%	43.7%	0.9%	1481
Pitalito	37.1%	12.7%	15.2%	34.6%	0.4%	1582
Popayán	36.5%	11.9%	12.5%	38.1%	1.1%	3086
Putumayo	36.1%	12.7%	14.8%	34.6%	1.7%	4142
Quibdó	30.1%	14.4%	21.0%	32.1%	2.4%	1317
Quindío	37.6%	13.6%	16.5%	30.5%	1.8%	2449
Riohacha	33.1%	14.8%	16.2%	33.8%	2.1%	2582
Rionegro	44.1%	10.5%	7.9%	36.4%	1.1%	1185
Risaralda	35.3%	12.5%	18.3%	32.7%	1.3%	2810
Sabaneta	36.4%	9.2%	11.0%	42.3%	1.2%	511
Sahagún	35.5%	15.2%	12.9%	34.5%	1.9%	1213
San Andrés	32.6%	16.6%	16.8%	32.3%	1.8%	555
Santa Marta	32.4%	13.3%	16.3%	36.6%	1.4%	5826
Santander	33.9%	10.9%	11.5%	43.1%	0.6%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	37.0%	13.5%	13.1%	35.7%	0.7%	3217
Soacha	31.9%	13.7%	13.8%	39.3%	1.3%	5620
Sogamoso	36.2%	9.2%	6.0%	48.2%	0.3%	1503
Soledad	35.4%	11.9%	12.4%	39.1%	1.2%	5505
Sucre	33.6%	14.7%	17.2%	33.3%	1.2%	7730
Tolima	34.3%	14.0%	14.6%	35.8%	1.3%	9717
Tuluá	39.5%	11.5%	13.9%	34.4%	0.8%	2129
Tumaco	28.4%	16.7%	25.5%	25.8%	3.7%	2375
Tunja	32.8%	9.2%	7.6%	49.8%	0.5%	1871
Turbo	36.1%	15.7%	21.8%	24.0%	2.4%	2122
Uribia	31.7%	19.4%	19.7%	26.0%	3.2%	1095
Valle del Cauca	38.0%	13.0%	16.1%	31.8%	1.1%	8498
Valledupar	32.4%	11.3%	14.7%	40.7%	0.9%	5289
Vichada	36.8%	12.6%	15.8%	31.1%	3.7%	779
Villavicencio	34.2%	11.3%	10.7%	42.1%	1.7%	5786
Yopal	31.7%	13.8%	11.0%	42.0%	1.4%	2008
Yumbo	43.4%	11.5%	13.9%	30.2%	1.0%	1265
Zipaquirá	31.6%	10.1%	11.1%	46.6%	0.5%	1284
Colombia	34.4%	12.6%	14.2%	37.4%	1.4%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 13.

En la siguiente tabla se presenta información incompleta de los precios de paquetes de dulces en una tienda.

Número de paquetes	Precio
1	
2	$1.800
3	
4	
5	$4.500

Tabla

Si cada paquete de dulces vale lo mismo, ¿cuánto valen tres paquetes?

A. $1.800
B. $2.700
C. $4.500
D. $6.300

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver y formular problemas sencillos de proporcionalidad directa e inversa.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	14.1%	33.7%	21.1%	28.2%	2.9%	978
Antioquia	9.5%	45.7%	21.8%	21.1%	1.9%	29373
Apartadó	10.8%	42.9%	21.7%	22.3%	2.4%	1757
Arauca	9.9%	50.4%	19.4%	19.0%	1.3%	2680
Armenia	10.0%	49.9%	20.7%	17.8%	1.6%	2580
Atlántico	11.8%	44.0%	21.2%	19.6%	3.4%	5978
Barrancabermeja	9.3%	52.3%	19.0%	17.3%	2.0%	2488
Barranquilla	10.9%	48.6%	19.4%	19.4%	1.6%	12401
Bello	7.9%	52.2%	19.8%	18.8%	1.3%	3836
Bogotá, D.C.	7.5%	57.2%	18.1%	15.4%	1.7%	66877
Bolívar	14.2%	36.8%	23.0%	23.2%	2.8%	11163
Boyacá	8.0%	57.5%	19.0%	14.8%	0.7%	9265
Bucaramanga	7.4%	60.7%	16.4%	14.3%	1.2%	5300
Buenaventura	13.2%	40.2%	20.3%	22.9%	3.5%	4160
Buga	9.3%	48.6%	20.0%	20.2%	1.9%	1238
Caldas	8.1%	48.3%	19.7%	22.7%	1.3%	5750
Cali	9.7%	50.0%	19.6%	18.7%	2.1%	19641
Caquetá	10.5%	43.9%	23.0%	20.6%	2.0%	3265
Cartagena	11.8%	46.5%	19.9%	19.4%	2.3%	11457
Cartago	9.5%	49.2%	20.9%	18.4%	2.0%	1274
Casanare	9.3%	51.8%	19.4%	18.6%	1.0%	3072
Cauca	10.5%	44.9%	19.5%	22.5%	2.6%	12628
Cesar	11.9%	43.5%	21.4%	21.4%	1.8%	8483
Chocó	13.4%	35.6%	21.7%	26.3%	3.0%	3852
Chía	5.7%	62.4%	17.1%	14.0%	0.9%	1448
Ciénaga	13.1%	43.9%	22.3%	16.3%	4.4%	1516
Cundinamarca	7.1%	58.4%	17.6%	15.8%	1.1%	16374
Córdoba	12.7%	37.3%	22.9%	25.2%	1.9%	13351
Cúcuta	9.0%	53.0%	18.6%	17.9%	1.4%	7404
Dosquebradas	6.7%	51.1%	19.4%	20.9%	1.9%	1863
Duitama	7.0%	65.6%	14.8%	11.9%	0.7%	1408
Envigado	7.3%	59.2%	17.7%	14.2%	1.5%	1415
Facatativá	6.9%	58.6%	18.8%	14.8%	0.9%	1412
Florencia	10.1%	45.6%	22.7%	20.0%	1.6%	2075
Floridablanca	7.9%	61.6%	15.5%	13.8%	1.2%	2586
Fusagasugá	7.9%	54.1%	19.3%	17.1%	1.5%	1232
Girardot	8.7%	45.8%	19.7%	22.9%	2.9%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	9.2%	55.7%	18.3%	15.6%	1.1%	1523
Guainía	10.3%	33.3%	20.9%	33.1%	2.5%	517
Guaviare	10.4%	43.9%	23.6%	20.5%	1.6%	914
Huila	8.5%	49.5%	20.1%	21.0%	0.9%	8204
Ibagué	8.5%	57.0%	17.0%	16.2%	1.3%	5546
Ipiales	9.6%	51.0%	17.8%	20.9%	0.7%	1485
Itagüí	9.7%	47.8%	22.7%	18.0%	1.8%	2028
Jamundí	10.7%	43.1%	22.1%	22.4%	1.7%	1103
La Guajira	13.1%	41.3%	20.5%	22.9%	2.3%	3931
Lorica	10.4%	44.9%	21.5%	20.6%	2.6%	1541
Magangué	16.0%	35.6%	21.2%	24.6%	2.5%	1648
Magdalena	13.2%	40.2%	21.0%	22.6%	3.1%	9172
Maicao	14.7%	37.9%	21.9%	23.5%	2.0%	2162
Malambo	11.6%	51.4%	17.2%	18.3%	1.5%	1278
Manizales	7.5%	54.7%	17.3%	19.3%	1.2%	3145
Medellín	9.5%	46.9%	22.8%	19.1%	1.7%	20621
Meta	9.3%	50.1%	20.8%	18.0%	1.7%	6012
Montería	12.4%	42.3%	21.4%	22.3%	1.6%	5509
Mosquera	6.8%	59.3%	17.4%	14.5%	1.9%	1286
Nariño	9.8%	48.2%	18.8%	21.0%	2.3%	9299
Neiva	9.3%	51.5%	19.8%	18.0%	1.3%	3661
Norte de Santander	8.6%	53.3%	18.6%	18.2%	1.2%	8026
Palmira	8.9%	53.3%	17.3%	19.3%	1.3%	2836
Pasto	8.5%	53.1%	18.8%	18.6%	1.0%	4034
Pereira	7.9%	53.7%	19.2%	17.8%	1.4%	4349
Piedecuesta	7.6%	57.3%	17.3%	16.9%	1.0%	1481
Pitalito	9.6%	49.1%	20.0%	20.2%	1.0%	1582
Popayán	9.3%	51.1%	18.5%	19.7%	1.4%	3086
Putumayo	9.6%	43.3%	21.8%	23.1%	2.2%	4142
Quibdó	12.3%	42.5%	20.0%	22.6%	2.5%	1317
Quindío	10.3%	47.6%	20.3%	19.8%	2.0%	2449
Riohacha	12.4%	41.9%	21.8%	21.3%	2.5%	2582
Rionegro	6.6%	57.9%	18.3%	16.0%	1.2%	1185
Risaralda	8.3%	48.3%	20.1%	21.4%	1.9%	2810
Sabaneta	8.4%	51.3%	19.8%	19.4%	1.2%	511
Sahagún	12.7%	39.4%	23.6%	22.6%	1.7%	1213
San Andrés	11.4%	43.4%	23.6%	20.0%	1.6%	555
Santa Marta	11.1%	47.5%	19.8%	19.7%	1.9%	5826
Santander	8.1%	57.5%	17.2%	16.3%	0.9%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	11.6%	46.0%	19.2%	21.9%	1.2%	3217
Soacha	8.1%	52.2%	20.4%	17.7%	1.5%	5620
Sogamoso	6.9%	64.1%	16.6%	11.7%	0.6%	1503
Soledad	11.2%	50.2%	18.7%	18.1%	1.9%	5505
Sucre	12.8%	40.0%	22.2%	23.4%	1.6%	7730
Tolima	9.7%	49.4%	19.5%	19.7%	1.7%	9717
Tuluá	8.2%	50.6%	20.2%	19.6%	1.4%	2129
Tumaco	15.6%	32.7%	23.6%	24.1%	4.0%	2375
Tunja	7.6%	62.6%	16.8%	12.3%	0.7%	1871
Turbo	14.2%	33.3%	23.1%	26.6%	2.7%	2122
Uribia	16.0%	29.7%	23.9%	26.2%	4.2%	1095
Valle del Cauca	9.3%	46.7%	21.1%	21.3%	1.6%	8498
Valledupar	10.5%	45.8%	19.9%	22.4%	1.3%	5289
Vichada	11.2%	34.1%	23.2%	27.7%	3.7%	779
Villavicencio	8.3%	55.4%	18.3%	16.7%	1.3%	5786
Yopal	10.1%	52.5%	19.4%	16.0%	1.9%	2008
Yumbo	9.2%	49.7%	21.2%	18.5%	1.4%	1265
Zipaquirá	7.2%	63.2%	14.0%	14.8%	0.8%	1284
Colombia	9.7%	49.4%	19.9%	19.2%	1.8%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 14.

Los estudiantes de un curso votaron para escoger el día de la semana en que realizarán una salida pedagógica. Estos fueron los resultados:

viernes, viernes, viernes, miércoles, martes, miércoles, lunes, martes, martes, lunes, jueves, miércoles, viernes, miércoles, martes, miércoles, viernes, miércoles, martes, miércoles.

¿En cuál tabla se presentan correctamente los resultados de la votación?

A.

Día	Número de votos
Lunes	2
Martes	5
Miércoles	7
Jueves	1
Viernes	5

B.

Día	Número de votos
Lunes	2
Martes	3
Miércoles	2
Jueves	1
Viernes	6

C.

Día	Número de votos
Lunes	7
Martes	5
Miércoles	2
Jueves	1
Viernes	5

D.

Día	Número de votos
Lunes	1
Martes	2
Miércoles	3
Jueves	4
Viernes	5

• Estructura

Competencia	Comunicación
Componente	Aleatorio
Afirmación	Clasificar y organizar la presentación de datos.
Nivel de desempeño	Mínimo
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	46.7%	18.4%	19.0%	13.5%	2.4%	978
Antioquia	63.6%	12.6%	12.3%	9.4%	2.1%	29373
Apartadó	61.3%	14.2%	12.1%	9.9%	2.5%	1757
Arauca	69.0%	11.9%	10.6%	7.1%	1.5%	2680
Armenia	68.4%	11.5%	11.5%	6.8%	1.8%	2580
Atlántico	56.6%	14.3%	15.0%	10.3%	3.9%	5978
Barrancabermeja	68.9%	11.4%	11.1%	6.8%	1.8%	2488
Barranquilla	68.0%	11.5%	11.3%	7.4%	1.8%	12401
Bello	71.8%	10.5%	9.4%	6.6%	1.6%	3836
Bogotá, D.C.	74.0%	9.1%	9.2%	5.9%	1.8%	66877
Bolívar	50.7%	16.7%	17.2%	12.1%	3.3%	11163
Boyacá	69.0%	11.2%	11.1%	7.9%	0.8%	9265
Bucaramanga	76.5%	7.9%	8.9%	5.2%	1.5%	5300
Buenaventura	60.8%	13.3%	12.1%	10.5%	3.2%	4160
Buga	69.7%	11.8%	10.4%	6.5%	1.6%	1238
Caldas	66.1%	12.6%	11.1%	8.7%	1.5%	5750
Cali	70.8%	10.8%	10.2%	6.3%	2.0%	19641
Caquetá	59.0%	14.5%	14.1%	10.5%	2.0%	3265
Cartagena	62.9%	13.2%	12.8%	8.9%	2.3%	11457
Cartago	67.4%	11.3%	11.2%	7.6%	2.4%	1274
Casanare	66.8%	11.6%	12.5%	7.7%	1.4%	3072
Cauca	61.4%	12.8%	12.6%	10.3%	2.9%	12628
Cesar	59.7%	14.4%	13.3%	10.7%	1.9%	8483
Chocó	51.8%	16.7%	14.8%	13.7%	3.0%	3852
Chía	75.0%	9.4%	8.6%	5.5%	1.5%	1448
Ciénaga	56.5%	15.2%	13.5%	10.9%	4.0%	1516
Cundinamarca	73.7%	9.2%	9.4%	6.3%	1.3%	16374
Córdoba	52.2%	16.7%	16.6%	12.5%	2.1%	13351
Cúcuta	72.2%	10.3%	9.9%	6.3%	1.4%	7404
Dosquebradas	72.8%	9.6%	9.5%	6.5%	1.6%	1863
Duitama	78.6%	6.7%	9.2%	5.0%	0.6%	1408
Envigado	75.8%	9.4%	8.5%	5.2%	1.1%	1415
Facatativá	77.4%	8.3%	7.7%	5.7%	0.8%	1412
Florencia	64.0%	12.6%	13.3%	8.6%	1.4%	2075
Floridablanca	76.6%	8.0%	8.7%	5.5%	1.2%	2586
Fusagasugá	73.3%	10.5%	8.4%	6.1%	1.8%	1232
Girardot	66.4%	13.4%	9.5%	7.8%	2.9%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	69.7%	11.9%	11.2%	6.4%	0.9%	1523
Guainía	53.2%	14.5%	14.1%	14.7%	3.5%	517
Guaviare	60.3%	13.8%	14.9%	8.4%	2.6%	914
Huila	68.5%	11.2%	11.4%	7.9%	1.0%	8204
Ibagué	73.3%	9.5%	10.2%	6.0%	1.0%	5546
Ipiales	70.8%	9.8%	10.7%	7.5%	1.1%	1485
Itagüí	63.9%	13.0%	12.6%	8.4%	2.1%	2028
Jamundí	61.1%	14.3%	14.9%	7.6%	2.1%	1103
La Guajira	56.2%	15.1%	15.1%	11.3%	2.3%	3931
Lorica	56.1%	13.4%	16.3%	10.8%	3.4%	1541
Magangué	53.4%	17.2%	15.7%	11.7%	2.1%	1648
Magdalena	53.4%	15.8%	15.2%	12.2%	3.3%	9172
Maicao	56.0%	15.6%	14.7%	11.0%	2.7%	2162
Malambo	62.1%	14.2%	12.0%	9.9%	1.8%	1278
Manizales	74.9%	9.3%	8.6%	5.9%	1.2%	3145
Medellín	63.8%	13.5%	13.0%	7.7%	2.0%	20621
Meta	64.0%	13.2%	12.3%	8.6%	1.8%	6012
Montería	60.8%	13.4%	14.0%	10.1%	1.8%	5509
Mosquera	77.1%	8.6%	8.0%	4.4%	1.8%	1286
Nariño	67.2%	10.6%	10.9%	9.2%	2.1%	9299
Neiva	70.6%	10.5%	10.8%	6.7%	1.4%	3661
Norte de Santander	70.1%	10.6%	10.5%	7.6%	1.3%	8026
Palmira	76.6%	8.5%	8.6%	5.2%	1.1%	2836
Pasto	74.4%	9.4%	9.9%	5.3%	1.0%	4034
Pereira	72.1%	9.9%	10.1%	6.2%	1.8%	4349
Piedecuesta	74.0%	8.8%	10.6%	5.4%	1.2%	1481
Pitalito	67.1%	12.3%	11.4%	8.5%	0.6%	1582
Popayán	71.1%	11.6%	9.8%	6.2%	1.3%	3086
Putumayo	61.2%	14.1%	12.6%	10.0%	2.2%	4142
Quibdó	59.5%	14.2%	11.4%	11.4%	3.6%	1317
Quindío	65.2%	12.2%	12.8%	7.6%	2.2%	2449
Riohacha	57.4%	13.6%	15.1%	11.0%	3.0%	2582
Rionegro	72.6%	9.7%	10.4%	6.2%	1.2%	1185
Risaralda	66.6%	11.6%	11.6%	8.5%	1.7%	2810
Sabaneta	71.4%	11.7%	10.8%	5.3%	0.8%	511
Sahagún	60.8%	13.7%	13.6%	10.0%	1.9%	1213
San Andrés	63.4%	13.0%	15.3%	7.2%	1.1%	555
Santa Marta	64.5%	11.8%	12.9%	8.5%	2.2%	5826
Santander	71.5%	9.8%	10.3%	7.5%	0.9%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	63.4%	13.2%	13.5%	8.3%	1.6%	3217
Soacha	70.2%	11.0%	10.8%	6.5%	1.5%	5620
Sogamoso	78.1%	8.4%	8.3%	4.7%	0.5%	1503
Soledad	69.3%	11.3%	10.1%	7.6%	1.7%	5505
Sucre	55.5%	15.3%	15.8%	11.4%	2.0%	7730
Tolima	65.3%	12.4%	11.8%	8.7%	1.8%	9717
Tuluá	72.4%	9.8%	9.3%	7.1%	1.4%	2129
Tumaco	44.8%	17.8%	17.9%	14.7%	4.8%	2375
Tunja	75.8%	8.9%	8.8%	5.7%	0.7%	1871
Turbo	50.8%	15.7%	17.3%	13.4%	2.8%	2122
Uribia	39.9%	21.6%	19.0%	15.3%	4.3%	1095
Valle del Cauca	67.2%	12.1%	11.4%	7.7%	1.6%	8498
Valledupar	68.0%	12.0%	10.3%	8.1%	1.5%	5289
Vichada	53.5%	15.3%	15.1%	11.4%	4.6%	779
Villavicencio	71.1%	10.7%	10.0%	6.7%	1.5%	5786
Yopal	67.4%	11.9%	11.4%	7.4%	2.0%	2008
Yumbo	67.4%	11.3%	12.4%	7.4%	1.4%	1265
Zipaquirá	77.4%	6.9%	8.7%	5.9%	1.1%	1284
Colombia	66.4%	11.9%	11.7%	8.2%	1.9%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 15.

En la clase de inglés, el profesor organizó un concurso. Cada vez que un estudiante traducía una palabra correctamente, el profesor dibujaba una rayita frente al nombre del estudiante.

En la tabla se presentan los resultados:

Nombre del estudiante	Número de palabras traducidas correctamente
Carlos	IIIIIIIIII
Juana	IIIIIII
José	IIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIII
Constanza	IIII
Maricela	IIIIIIIIIIIIIIII
Víctor	II
Amanda	IIIII
Reinaldo	IIIIIIIIII
Viviana	IIIIIIII
Daniela	IIIIIIIIIIIIIIIIIIIIIIIIIIIIIII

Tabla

¿Quiénes fueron los tres estudiantes que tradujeron, correctamente, más palabras?

A. Carlos, Juana y José.
B. José, Daniela y Maricela.
C. Daniela, Viviana y Reinaldo.
D. Constanza, Víctor y Amanda.

• Estructura

Competencia	Comunicación
Componente	Aleatorio
Afirmación	Describir e interpretar datos relativos a situaciones del entorno escolar.
Nivel de desempeño	Mínimo
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	10.2%	67.0%	12.8%	6.7%	3.3%	978
Antioquia	8.2%	73.8%	9.7%	6.2%	2.1%	29373
Apartadó	8.8%	71.0%	10.5%	6.3%	3.4%	1757
Arauca	8.0%	75.5%	9.5%	5.3%	1.6%	2680
Armenia	7.9%	73.9%	9.9%	6.9%	1.4%	2580
Atlántico	9.9%	66.6%	12.0%	7.8%	3.7%	5978
Barrancabermeja	8.5%	75.6%	8.6%	5.5%	1.8%	2488
Barranquilla	8.2%	74.8%	9.1%	6.0%	1.9%	12401
Bello	6.9%	78.2%	8.1%	5.3%	1.5%	3836
Bogotá, D.C.	6.1%	80.1%	7.5%	4.4%	1.9%	66877
Bolívar	11.7%	63.5%	12.7%	8.9%	3.2%	11163
Boyacá	6.6%	78.3%	9.1%	5.1%	0.9%	9265
Bucaramanga	5.9%	80.4%	7.4%	4.9%	1.3%	5300
Buenaventura	9.3%	70.2%	10.2%	6.8%	3.5%	4160
Buga	7.2%	77.1%	8.6%	5.0%	2.1%	1238
Caldas	7.4%	75.9%	9.4%	6.0%	1.3%	5750
Cali	7.2%	77.2%	8.4%	5.3%	2.0%	19641
Caquetá	8.9%	70.4%	11.0%	7.8%	2.0%	3265
Cartagena	8.9%	71.3%	10.3%	7.1%	2.4%	11457
Cartago	8.3%	75.3%	9.5%	4.7%	2.2%	1274
Casanare	7.4%	76.3%	9.8%	4.9%	1.7%	3072
Cauca	8.3%	74.3%	8.9%	5.4%	3.0%	12628
Cesar	9.8%	70.6%	10.5%	7.3%	1.8%	8483
Chocó	11.1%	66.1%	11.9%	7.9%	3.0%	3852
Chía	6.1%	80.9%	7.1%	4.6%	1.4%	1448
Ciénaga	9.2%	68.3%	9.8%	9.0%	3.6%	1516
Cundinamarca	6.1%	80.6%	7.7%	4.3%	1.3%	16374
Córdoba	11.3%	65.5%	12.6%	8.4%	2.2%	13351
Cúcuta	7.1%	77.3%	9.0%	5.2%	1.4%	7404
Dosquebradas	6.4%	80.0%	6.5%	5.0%	2.0%	1863
Duitama	5.0%	82.7%	7.7%	4.0%	0.7%	1408
Envigado	6.0%	80.7%	7.6%	4.5%	1.1%	1415
Facatativá	5.6%	82.2%	8.1%	3.4%	0.8%	1412
Florencia	9.1%	71.6%	11.3%	6.7%	1.3%	2075
Floridablanca	6.3%	80.9%	7.8%	3.9%	1.2%	2586
Fusagasugá	5.9%	80.1%	7.1%	5.1%	1.7%	1232
Girardot	9.7%	70.7%	10.2%	6.4%	3.0%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	7.9%	75.6%	8.9%	6.4%	1.2%	1523
Guainía	9.5%	75.2%	9.1%	2.7%	3.5%	517
Guaviare	9.4%	69.6%	10.1%	8.3%	2.6%	914
Huila	7.1%	78.4%	8.5%	5.0%	1.0%	8204
Ibagué	6.5%	79.4%	8.6%	4.3%	1.2%	5546
Ipiales	6.3%	78.4%	9.2%	4.8%	1.2%	1485
Itagüí	8.9%	70.2%	10.9%	7.7%	2.2%	2028
Jamundí	8.7%	68.2%	12.1%	9.2%	1.8%	1103
La Guajira	11.0%	66.4%	11.5%	8.2%	2.8%	3931
Lorica	11.6%	68.1%	10.6%	6.6%	3.0%	1541
Magangué	12.0%	63.8%	14.0%	7.9%	2.2%	1648
Magdalena	11.0%	66.3%	11.7%	7.9%	3.1%	9172
Maicao	10.8%	66.5%	11.8%	8.1%	2.8%	2162
Malambo	9.0%	73.0%	9.9%	5.9%	2.2%	1278
Manizales	6.4%	80.3%	7.8%	4.0%	1.5%	3145
Medellín	9.0%	69.9%	11.4%	7.6%	2.0%	20621
Meta	8.3%	73.6%	9.9%	6.3%	1.9%	6012
Montería	9.6%	69.9%	10.8%	8.0%	1.7%	5509
Mosquera	5.4%	80.9%	7.1%	4.7%	1.9%	1286
Nariño	6.9%	79.1%	7.4%	4.5%	2.2%	9299
Neiva	8.5%	75.5%	8.9%	5.7%	1.4%	3661
Norte de Santander	7.2%	78.0%	8.3%	5.0%	1.4%	8026
Palmira	5.9%	79.5%	8.0%	5.0%	1.6%	2836
Pasto	6.1%	81.2%	7.6%	4.2%	0.9%	4034
Pereira	7.1%	78.5%	8.0%	4.7%	1.6%	4349
Piedecuesta	6.1%	80.8%	7.8%	4.3%	1.0%	1481
Pitalito	6.4%	78.7%	8.5%	5.7%	0.8%	1582
Popayán	5.4%	80.3%	8.5%	4.6%	1.2%	3086
Putumayo	8.4%	73.3%	9.9%	6.1%	2.3%	4142
Quibdó	11.8%	66.3%	11.1%	7.8%	3.0%	1317
Quindío	7.9%	75.3%	8.5%	6.3%	2.0%	2449
Riohacha	10.4%	68.4%	11.3%	7.1%	2.8%	2582
Rionegro	6.0%	79.3%	7.4%	6.2%	1.0%	1185
Risaralda	7.3%	76.2%	9.4%	5.5%	1.7%	2810
Sabaneta	7.2%	77.9%	9.2%	4.9%	0.8%	511
Sahagún	8.0%	70.4%	11.5%	7.9%	2.1%	1213
San Andrés	9.2%	67.7%	12.1%	9.5%	1.4%	555
Santa Marta	9.1%	72.2%	10.5%	6.1%	2.1%	5826
Santander	6.6%	79.7%	7.9%	4.9%	0.9%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	9.2%	69.9%	11.7%	7.7%	1.5%	3217
Soacha	7.2%	76.6%	9.1%	5.4%	1.7%	5620
Sogamoso	6.3%	82.4%	6.5%	4.3%	0.5%	1503
Soledad	7.7%	76.4%	8.5%	5.4%	2.0%	5505
Sucre	10.6%	68.0%	11.6%	8.0%	1.9%	7730
Tolima	8.3%	75.1%	9.4%	5.2%	2.0%	9717
Tuluá	6.8%	79.5%	7.8%	4.5%	1.5%	2129
Tumaco	13.2%	58.4%	13.4%	10.0%	5.0%	2375
Tunja	6.9%	80.4%	6.6%	5.1%	1.0%	1871
Turbo	11.9%	62.5%	14.1%	8.8%	2.7%	2122
Uribia	14.3%	57.6%	14.2%	9.0%	4.7%	1095
Valle del Cauca	7.9%	75.1%	9.6%	5.7%	1.7%	8498
Valledupar	7.9%	75.4%	9.2%	5.7%	1.8%	5289
Vichada	8.7%	70.3%	10.1%	6.7%	4.1%	779
Villavicencio	7.3%	76.7%	8.7%	5.7%	1.5%	5786
Yopal	7.4%	75.8%	8.9%	5.9%	2.0%	2008
Yumbo	7.8%	75.3%	8.6%	6.6%	1.7%	1265
Zipaquirá	5.0%	83.5%	6.5%	3.8%	1.2%	1284
Colombia	8.0%	74.8%	9.4%	5.9%	1.9%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 16.

Lucía quiere saber cuánto pesa. ¿Cuál de los siguientes instrumentos debe utilizar?

A.

Cinta métrica (metro)

B.

Báscula

C.

Cronómetro

D.

Termómetro

• Estructura

Competencia	Comunicación
Componente	Espacial - métrico
Afirmación	Establecer relaciones entre los atributos mesurables de un objeto o evento y sus respectivas magnitudes.
Nivel de desempeño	Mínimo
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	10.5%	67.9%	11.2%	7.3%	3.1%	978
Antioquia	7.8%	77.9%	7.4%	4.9%	2.0%	29373
Apartadó	8.9%	74.8%	8.2%	5.1%	3.0%	1757
Arauca	6.8%	80.5%	6.5%	4.7%	1.5%	2680
Armenia	7.7%	77.7%	7.9%	5.0%	1.6%	2580
Atlántico	9.9%	71.6%	8.3%	6.2%	4.0%	5978
Barrancabermeja	6.4%	80.1%	7.1%	4.3%	2.0%	2488
Barranquilla	7.5%	79.0%	6.8%	4.9%	1.8%	12401
Bello	6.5%	80.9%	6.7%	4.4%	1.4%	3836
Bogotá, D.C.	5.6%	83.3%	5.4%	3.8%	1.9%	66877
Bolívar	11.9%	67.9%	9.7%	7.5%	3.1%	11163
Boyacá	5.7%	84.4%	5.4%	3.8%	0.8%	9265
Bucaramanga	5.5%	84.2%	5.6%	3.4%	1.2%	5300
Buenaventura	10.2%	72.7%	7.5%	6.0%	3.7%	4160
Buga	6.3%	81.2%	6.3%	4.3%	1.9%	1238
Caldas	7.1%	80.1%	7.0%	4.5%	1.4%	5750
Cali	6.7%	80.7%	6.3%	4.3%	1.9%	19641
Caquetá	9.1%	75.3%	8.2%	5.5%	2.0%	3265
Cartagena	8.7%	75.6%	8.0%	5.3%	2.4%	11457
Cartago	7.2%	78.1%	7.7%	4.9%	2.0%	1274
Casanare	6.9%	79.9%	6.9%	4.7%	1.6%	3072
Cauca	8.2%	78.4%	6.4%	4.0%	3.0%	12628
Cesar	8.3%	75.3%	8.6%	6.0%	1.8%	8483
Chocó	15.7%	66.7%	8.7%	5.9%	3.1%	3852
Chía	3.8%	86.0%	5.5%	3.4%	1.3%	1448
Ciénaga	9.9%	71.1%	8.6%	5.9%	4.5%	1516
Cundinamarca	5.5%	84.5%	5.2%	3.5%	1.2%	16374
Córdoba	11.1%	71.0%	9.3%	6.5%	2.1%	13351
Cúcuta	6.9%	80.8%	6.4%	4.6%	1.3%	7404
Dosquebradas	5.2%	84.5%	5.2%	3.1%	2.1%	1863
Duitama	4.0%	86.8%	5.5%	3.2%	0.5%	1408
Envigado	5.9%	83.4%	5.9%	3.8%	1.1%	1415
Facatativá	5.1%	84.8%	6.2%	2.9%	1.1%	1412
Florencia	8.2%	77.9%	7.2%	5.1%	1.6%	2075
Floridablanca	5.8%	84.0%	5.6%	3.6%	1.0%	2586
Fusagasugá	5.3%	84.1%	5.6%	3.4%	1.6%	1232
Girardot	6.8%	79.8%	6.4%	4.1%	2.9%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	6.6%	81.4%	7.6%	3.7%	0.7%	1523
Guainía	11.0%	74.5%	6.2%	4.6%	3.7%	517
Guaviare	7.9%	76.0%	8.8%	4.9%	2.4%	914
Huila	6.5%	84.0%	5.1%	3.4%	0.9%	8204
Ibagué	6.3%	83.3%	5.4%	3.8%	1.2%	5546
Ipiales	7.0%	82.3%	5.4%	4.1%	1.2%	1485
Itagüí	9.0%	74.9%	8.4%	6.1%	1.7%	2028
Jamundí	9.0%	76.6%	7.3%	5.2%	1.9%	1103
La Guajira	12.1%	69.7%	8.9%	6.6%	2.7%	3931
Lorica	11.3%	72.2%	7.7%	5.5%	3.2%	1541
Magangué	11.7%	69.1%	9.7%	7.5%	2.1%	1648
Magdalena	10.4%	71.1%	8.3%	6.7%	3.5%	9172
Maicao	11.4%	69.4%	9.3%	7.3%	2.7%	2162
Malambo	9.9%	78.0%	6.1%	4.4%	1.6%	1278
Manizales	5.3%	84.7%	5.7%	3.2%	1.1%	3145
Medellín	8.6%	73.3%	9.5%	6.5%	2.0%	20621
Meta	7.1%	77.8%	7.6%	5.7%	1.9%	6012
Montería	9.5%	73.5%	9.1%	6.2%	1.6%	5509
Mosquera	3.9%	86.6%	5.2%	2.5%	1.8%	1286
Nariño	6.5%	83.2%	4.7%	3.5%	2.1%	9299
Neiva	6.4%	81.0%	7.3%	3.9%	1.4%	3661
Norte de Santander	6.4%	82.9%	5.5%	3.8%	1.4%	8026
Palmira	6.7%	83.4%	5.3%	3.3%	1.2%	2836
Pasto	4.9%	86.3%	4.9%	3.0%	0.9%	4034
Pereira	6.3%	82.7%	5.5%	3.9%	1.5%	4349
Piedecuesta	6.1%	82.9%	5.8%	3.6%	1.5%	1481
Pitalito	6.1%	81.9%	6.4%	4.7%	0.9%	1582
Popayán	6.3%	82.0%	6.6%	3.9%	1.3%	3086
Putumayo	8.6%	77.6%	7.5%	4.2%	2.1%	4142
Quibdó	10.2%	72.1%	7.1%	7.6%	3.0%	1317
Quindío	7.4%	78.4%	7.0%	4.9%	2.3%	2449
Riohacha	10.6%	71.0%	9.4%	5.9%	3.1%	2582
Rionegro	5.6%	82.7%	5.9%	4.6%	1.3%	1185
Risaralda	6.4%	81.8%	5.9%	3.8%	2.1%	2810
Sabaneta	4.1%	82.8%	6.7%	5.1%	1.4%	511
Sahagún	7.7%	77.2%	6.6%	6.4%	2.0%	1213
San Andrés	9.0%	74.2%	9.4%	5.9%	1.4%	555
Santa Marta	8.4%	76.0%	8.1%	5.4%	2.1%	5826
Santander	5.1%	85.2%	5.1%	3.6%	1.0%	8664

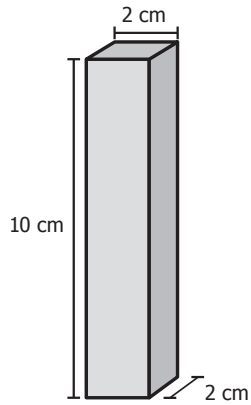
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	8.1%	76.6%	7.6%	6.2%	1.5%	3217
Soacha	6.6%	80.9%	6.4%	4.6%	1.5%	5620
Sogamoso	3.5%	85.6%	6.2%	3.9%	0.7%	1503
Soledad	7.6%	80.1%	6.3%	4.5%	1.5%	5505
Sucre	10.1%	73.9%	8.8%	5.5%	1.7%	7730
Tolima	7.7%	79.8%	6.5%	4.2%	1.9%	9717
Tuluá	6.4%	82.2%	6.2%	3.8%	1.5%	2129
Tumaco	13.2%	61.7%	12.0%	8.8%	4.4%	2375
Tunja	5.1%	84.7%	6.1%	3.2%	1.0%	1871
Turbo	11.8%	68.0%	10.2%	6.7%	3.2%	2122
Uribia	14.6%	63.1%	10.7%	7.3%	4.3%	1095
Valle del Cauca	7.6%	79.9%	6.4%	4.7%	1.4%	8498
Valledupar	7.4%	80.6%	6.4%	4.1%	1.5%	5289
Vichada	9.9%	70.9%	8.3%	6.2%	4.7%	779
Villavicencio	6.4%	80.3%	7.0%	4.7%	1.6%	5786
Yopal	7.3%	79.6%	6.7%	4.4%	1.9%	2008
Yumbo	7.4%	80.7%	7.1%	3.6%	1.3%	1265
Zipaquirá	5.4%	85.1%	5.4%	3.2%	0.9%	1284
Colombia	7.5%	78.9%	6.9%	4.7%	1.9%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

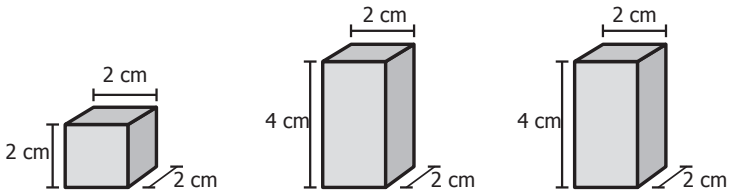
• Pregunta 17.

Observa la torre y algunas de sus medidas.

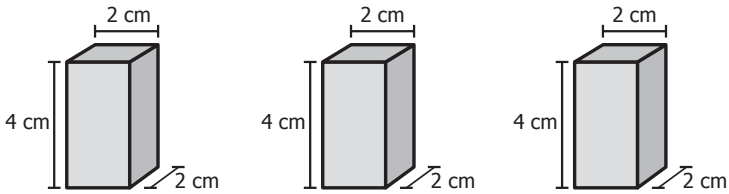


¿Con cuál de los siguientes grupos de bloques se puede armar una torre que tenga las mismas medidas que ésta?

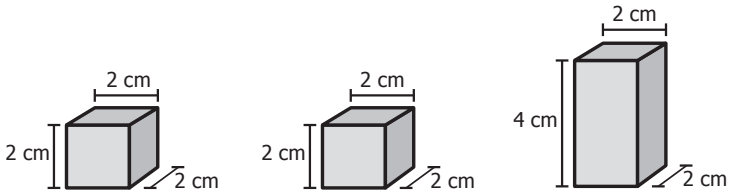
A.



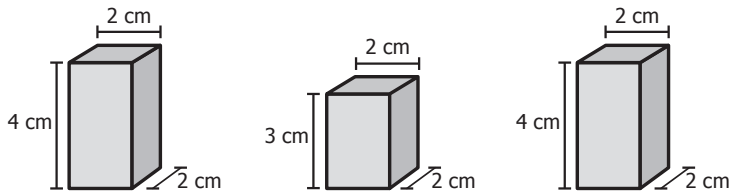
B.



C.



D.



• Estructura

Competencia	Razonamiento
Componente	Espacial - métrico
Afirmación	Construir y descomponer figuras planas y sólidas a partir de condiciones dadas.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	42.4%	20.1%	15.6%	18.4%	3.4%	978
Antioquia	52.2%	17.2%	13.4%	15.1%	2.1%	29373
Apartadó	50.5%	17.0%	12.6%	16.8%	3.1%	1757
Arauca	56.8%	15.2%	13.1%	13.4%	1.5%	2680
Armenia	56.8%	13.6%	13.1%	14.8%	1.6%	2580
Atlántico	48.4%	17.1%	14.4%	16.4%	3.8%	5978
Barrancabermeja	55.8%	15.8%	12.1%	13.9%	2.3%	2488
Barranquilla	52.9%	16.2%	13.4%	15.7%	1.9%	12401
Bello	56.5%	15.6%	12.6%	13.8%	1.6%	3836
Bogotá, D.C.	62.2%	12.6%	10.9%	12.3%	2.0%	66877
Bolívar	42.9%	20.5%	16.0%	17.7%	3.0%	11163
Boyacá	58.6%	14.6%	12.7%	13.2%	0.9%	9265
Bucaramanga	64.1%	12.4%	11.1%	10.8%	1.5%	5300
Buenaventura	49.2%	18.0%	12.9%	16.2%	3.8%	4160
Buga	55.2%	18.3%	11.2%	13.6%	1.8%	1238
Caldas	54.1%	15.4%	13.6%	15.4%	1.5%	5750
Cali	57.1%	14.9%	11.9%	13.9%	2.2%	19641
Caquetá	52.1%	18.2%	14.2%	13.6%	1.8%	3265
Cartagena	52.5%	16.7%	12.9%	15.4%	2.4%	11457
Cartago	55.9%	15.9%	11.5%	14.6%	2.1%	1274
Casanare	54.5%	17.4%	13.0%	13.4%	1.7%	3072
Cauca	55.0%	17.3%	11.1%	13.6%	2.9%	12628
Cesar	52.3%	17.3%	13.0%	15.8%	1.7%	8483
Chocó	44.0%	20.8%	14.2%	18.1%	2.9%	3852
Chía	66.1%	10.2%	12.2%	9.9%	1.7%	1448

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Ciénaga	50.1%	18.7%	12.5%	14.9%	3.9%	1516
Cundinamarca	62.9%	12.6%	11.4%	11.8%	1.4%	16374
Córdoba	43.6%	20.4%	15.3%	18.5%	2.2%	13351
Cúcuta	56.6%	16.2%	12.9%	12.9%	1.5%	7404
Dosquebradas	59.2%	13.6%	11.9%	13.1%	2.2%	1863
Duitama	65.8%	12.1%	11.0%	10.2%	0.9%	1408
Envigado	63.6%	11.9%	11.9%	11.4%	1.2%	1415
Facatativá	61.0%	14.7%	12.3%	10.8%	1.1%	1412
Florencia	52.2%	16.9%	13.5%	15.8%	1.6%	2075
Floridablanca	62.7%	12.0%	10.6%	13.4%	1.2%	2586
Fusagasugá	58.0%	14.9%	11.9%	13.3%	1.9%	1232
Girardot	54.3%	17.5%	11.4%	13.1%	3.7%	895
Girón	55.9%	16.3%	12.7%	14.0%	1.1%	1523
Guainía	43.1%	27.7%	14.3%	12.2%	2.7%	517
Guaviare	51.0%	17.3%	13.8%	16.2%	1.8%	914
Huila	59.1%	15.0%	12.2%	12.7%	0.9%	8204
Ibagué	61.5%	13.2%	11.1%	12.8%	1.4%	5546
Ipiales	59.0%	14.5%	13.5%	11.7%	1.2%	1485
Itagüí	50.2%	15.8%	16.4%	15.8%	1.8%	2028
Jamundí	47.8%	19.5%	14.8%	16.1%	1.8%	1103
La Guajira	46.6%	20.9%	13.8%	15.9%	2.7%	3931
Lorica	48.2%	18.6%	12.7%	17.3%	3.3%	1541
Magangué	43.8%	19.1%	16.3%	18.7%	2.2%	1648
Magdalena	47.0%	19.7%	13.8%	16.2%	3.3%	9172
Maicao	43.8%	20.7%	15.3%	17.3%	3.0%	2162
Malambo	55.8%	16.4%	11.4%	14.6%	1.7%	1278
Manizales	60.8%	13.5%	11.0%	13.3%	1.4%	3145
Medellín	50.7%	16.3%	14.4%	16.4%	2.1%	20621
Meta	53.2%	16.6%	13.5%	15.0%	1.7%	6012
Montería	48.2%	18.9%	14.4%	16.8%	1.7%	5509
Mosquera	63.2%	12.6%	10.5%	11.4%	2.3%	1286
Nariño	58.9%	16.4%	10.7%	11.9%	2.2%	9299
Neiva	54.9%	15.4%	13.4%	14.6%	1.7%	3661
Norte de Santander	58.5%	15.5%	12.3%	12.2%	1.5%	8026
Palmira	58.3%	14.2%	12.8%	13.4%	1.3%	2836
Pasto	62.0%	13.8%	11.5%	11.4%	1.2%	4034
Pereira	58.0%	14.8%	12.4%	13.2%	1.6%	4349
Piedecuesta	62.5%	12.4%	11.4%	12.4%	1.4%	1481
Pitalito	56.7%	15.5%	13.5%	13.7%	0.7%	1582

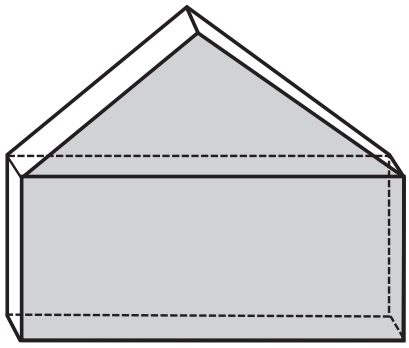
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Popayán	58.5%	14.2%	12.2%	13.4%	1.7%	3086
Putumayo	52.9%	17.4%	13.2%	14.1%	2.4%	4142
Quibdó	47.0%	19.6%	13.2%	16.9%	3.3%	1317
Quindío	53.5%	15.4%	13.9%	15.3%	1.9%	2449
Riohacha	47.2%	19.1%	13.6%	17.1%	3.1%	2582
Rionegro	60.8%	14.3%	10.8%	13.0%	1.1%	1185
Risaralda	54.7%	16.8%	11.5%	14.9%	2.1%	2810
Sabaneta	61.4%	12.9%	12.3%	12.1%	1.2%	511
Sahagún	47.6%	17.6%	15.2%	17.5%	2.1%	1213
San Andrés	44.1%	17.3%	16.9%	20.2%	1.4%	555
Santa Marta	51.3%	17.0%	13.3%	16.1%	2.4%	5826
Santander	60.1%	14.2%	11.5%	13.0%	1.1%	8664
Sincelejo	50.5%	17.0%	14.3%	16.5%	1.7%	3217
Soacha	56.7%	15.0%	12.8%	13.8%	1.7%	5620
Sogamoso	66.3%	10.8%	10.6%	11.3%	1.1%	1503
Soledad	56.4%	15.9%	12.6%	13.0%	2.1%	5505
Sucre	46.5%	20.4%	14.3%	17.3%	1.6%	7730
Tolima	55.9%	15.6%	12.4%	14.1%	2.0%	9717
Tuluá	60.0%	14.2%	11.1%	13.1%	1.6%	2129
Tumaco	37.5%	23.5%	15.8%	18.9%	4.3%	2375
Tunja	63.2%	12.2%	11.9%	12.0%	0.7%	1871
Turbo	42.6%	19.9%	15.6%	19.4%	2.5%	2122
Uribia	33.7%	26.9%	15.2%	19.5%	4.7%	1095
Valle del Cauca	54.9%	16.0%	13.5%	14.0%	1.6%	8498
Valledupar	55.1%	17.1%	12.0%	14.4%	1.4%	5289
Vichada	46.3%	19.1%	15.3%	14.4%	4.9%	779
Villavicencio	57.6%	14.6%	12.6%	13.4%	1.8%	5786
Yopal	58.0%	14.4%	11.9%	13.5%	2.2%	2008
Yumbo	55.3%	16.2%	12.7%	14.2%	1.6%	1265
Zipaquirá	66.2%	12.6%	9.1%	10.9%	1.2%	1284
Colombia	55.1%	15.9%	12.7%	14.3%	2.0%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

- **Pregunta 18.**

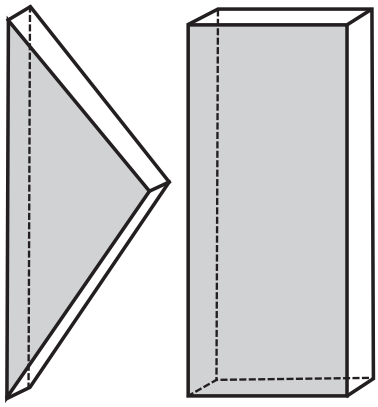
Oswaldo utilizó dos bloques distintos para armar un sólido como el de la figura.



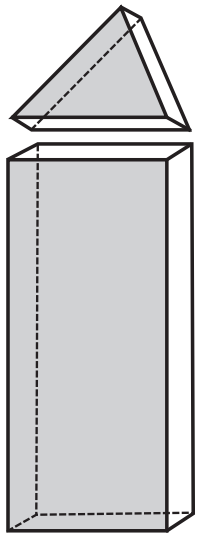
Figura

¿Con cuál de los siguientes grupos de bloques Oswaldo armó el sólido?

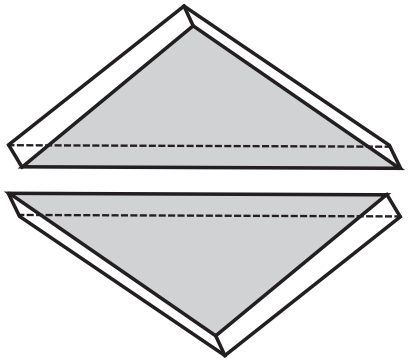
A.



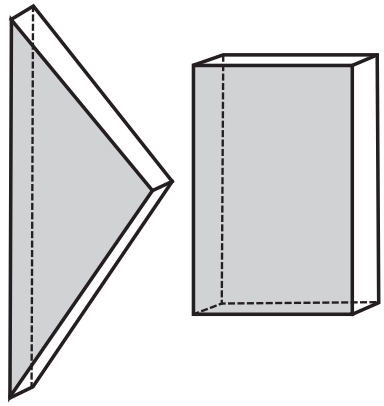
B.



C.



D.



• Estructura

Competencia	Razonamiento
Componente	Espacial - métrico
Afirmación	Costruir y descomponer figuras planas y sólidos a partir de condiciones dadas.
Nivel de desempeño	Mínimo
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	68.6%	10.3%	6.1%	11.9%	3.1%	978
Antioquia	77.5%	6.7%	4.3%	9.9%	1.6%	29373
Apartadó	76.4%	6.8%	4.8%	9.0%	2.9%	1757
Arauca	79.8%	5.7%	4.0%	9.4%	1.0%	2680
Armenia	79.0%	7.0%	3.9%	8.9%	1.2%	2580
Atlántico	74.6%	6.8%	4.8%	10.8%	3.0%	5978
Barrancabermeja	78.7%	5.8%	4.2%	9.7%	1.5%	2488
Barranquilla	78.2%	6.3%	3.9%	10.3%	1.3%	12401
Bello	79.9%	5.8%	3.6%	9.5%	1.2%	3836
Bogotá, D.C.	81.4%	5.1%	3.1%	8.6%	1.7%	66877
Bolívar	69.5%	9.5%	6.2%	12.4%	2.4%	11163
Boyacá	80.2%	5.7%	3.9%	9.7%	0.5%	9265
Bucaramanga	83.2%	4.5%	2.8%	8.4%	1.2%	5300
Buenaventura	73.7%	7.1%	5.7%	10.7%	2.8%	4160
Buga	77.1%	5.8%	3.9%	11.2%	1.9%	1238
Caldas	77.7%	6.6%	4.6%	10.1%	1.0%	5750
Cali	79.6%	5.6%	3.5%	9.8%	1.6%	19641
Caquetá	75.2%	9.2%	4.3%	10.0%	1.4%	3265
Cartagena	76.5%	6.8%	4.4%	10.6%	1.7%	11457
Cartago	79.4%	6.2%	4.1%	8.4%	1.9%	1274
Casanare	78.4%	7.1%	4.5%	9.0%	1.1%	3072
Cauca	76.4%	6.4%	4.2%	10.6%	2.3%	12628
Cesar	75.6%	7.1%	5.0%	10.9%	1.4%	8483
Chocó	71.8%	7.6%	6.9%	10.8%	2.8%	3852

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Chía	81.3%	5.7%	3.7%	8.1%	1.2%	1448
Ciénaga	73.3%	6.1%	6.3%	10.9%	3.5%	1516
Cundinamarca	81.8%	5.0%	3.3%	8.9%	1.0%	16374
Córdoba	70.9%	8.8%	5.8%	12.9%	1.5%	13351
Cúcuta	81.3%	5.7%	3.8%	8.1%	1.0%	7404
Dosquebradas	79.7%	5.4%	3.2%	9.9%	1.8%	1863
Duitama	83.2%	4.8%	2.8%	8.8%	0.5%	1408
Envigado	83.3%	6.3%	2.7%	6.6%	1.2%	1415
Facatativá	82.2%	4.9%	3.4%	8.9%	0.6%	1412
Florencia	77.4%	7.4%	4.6%	9.4%	1.2%	2075
Floridablanca	82.2%	4.6%	3.6%	8.8%	0.8%	2586
Fusagasugá	80.1%	5.8%	2.8%	9.7%	1.7%	1232
Girardot	77.2%	6.4%	3.9%	9.8%	2.7%	895
Girón	80.7%	6.1%	3.4%	9.1%	0.7%	1523
Guainía	73.5%	7.9%	4.1%	11.4%	3.1%	517
Guaviare	75.1%	6.7%	6.0%	10.2%	2.1%	914
Huila	80.6%	5.1%	3.6%	10.0%	0.7%	8204
Ibagué	82.3%	5.4%	3.1%	8.3%	0.9%	5546
Ipiales	81.0%	5.5%	4.2%	8.6%	0.7%	1485
Itagüí	74.9%	9.3%	4.0%	10.3%	1.6%	2028
Jamundí	78.1%	6.8%	5.1%	8.8%	1.3%	1103
La Guajira	71.7%	7.9%	6.3%	11.9%	2.2%	3931
Lorica	75.0%	7.4%	4.5%	11.0%	2.1%	1541
Magangué	71.1%	8.5%	6.0%	12.7%	1.7%	1648
Magdalena	72.5%	7.2%	5.7%	12.1%	2.4%	9172
Maicao	69.5%	8.1%	8.0%	11.8%	2.5%	2162
Malambo	81.0%	5.0%	3.8%	8.9%	1.3%	1278
Manizales	82.5%	4.7%	3.0%	8.8%	0.9%	3145
Medellín	74.9%	8.7%	4.7%	10.1%	1.6%	20621
Meta	76.7%	7.8%	4.4%	9.9%	1.2%	6012
Montería	75.9%	6.7%	4.6%	11.6%	1.2%	5509
Mosquera	83.0%	5.6%	1.6%	8.2%	1.6%	1286
Nariño	80.1%	4.7%	3.5%	9.9%	1.7%	9299
Neiva	79.2%	5.8%	3.5%	10.3%	1.1%	3661
Norte de Santander	80.4%	5.8%	3.6%	9.1%	1.1%	8026
Palmira	80.9%	5.3%	2.9%	9.9%	1.0%	2836
Pasto	82.8%	5.4%	3.0%	8.1%	0.8%	4034
Pereira	80.3%	5.5%	3.8%	9.2%	1.2%	4349
Piedecuesta	83.1%	5.1%	2.7%	7.9%	1.2%	1481

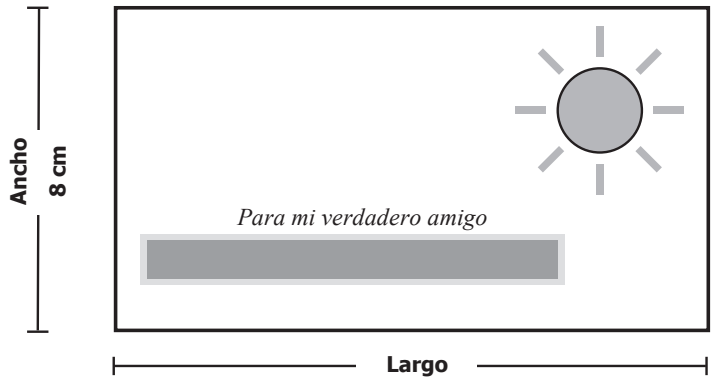
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Pitalito	77.4%	7.0%	3.8%	11.3%	0.5%	1582
Popayán	81.2%	6.4%	2.9%	8.6%	1.0%	3086
Putumayo	76.6%	6.9%	4.6%	10.0%	1.9%	4142
Quibdó	72.6%	7.1%	4.9%	12.5%	2.9%	1317
Quindío	80.0%	5.7%	3.7%	9.0%	1.6%	2449
Riohacha	71.0%	8.3%	6.7%	11.8%	2.1%	2582
Rionegro	81.5%	5.0%	2.8%	9.7%	1.0%	1185
Risaralda	78.2%	6.3%	3.8%	9.9%	1.7%	2810
Sabaneta	79.1%	8.4%	2.9%	9.0%	0.6%	511
Sahagún	74.9%	5.9%	5.0%	12.2%	1.9%	1213
San Andrés	75.7%	8.6%	4.1%	10.3%	1.3%	555
Santa Marta	76.5%	6.0%	4.7%	11.2%	1.6%	5826
Santander	81.8%	4.6%	3.6%	9.4%	0.6%	8664
Sincelejo	76.1%	7.3%	4.1%	11.7%	0.9%	3217
Soacha	79.3%	5.9%	3.8%	9.9%	1.2%	5620
Sogamoso	85.4%	4.9%	2.5%	6.7%	0.5%	1503
Soledad	79.7%	5.6%	3.4%	10.0%	1.3%	5505
Sucre	73.9%	7.3%	5.2%	12.4%	1.2%	7730
Tolima	77.3%	6.0%	4.4%	10.7%	1.5%	9717
Tuluá	80.3%	5.4%	3.9%	9.4%	1.0%	2129
Tumaco	63.4%	9.9%	8.5%	14.6%	3.6%	2375
Tunja	84.1%	4.7%	2.8%	7.4%	1.0%	1871
Turbo	70.6%	8.3%	5.9%	12.6%	2.5%	2122
Uribia	56.7%	15.0%	12.7%	12.4%	3.2%	1095
Valle del Cauca	78.9%	6.4%	4.0%	9.6%	1.2%	8498
Valledupar	79.5%	5.4%	3.9%	10.2%	1.1%	5289
Vichada	65.1%	11.9%	8.0%	11.3%	3.7%	779
Villavicencio	79.7%	6.5%	3.6%	8.9%	1.3%	5786
Yopal	79.4%	5.5%	3.7%	9.9%	1.5%	2008
Yumbo	82.3%	3.9%	2.8%	9.7%	1.3%	1265
Zipaquirá	82.5%	3.7%	3.7%	9.3%	0.7%	1284
Colombia	78.0%	6.3%	4.1%	10.0%	1.5%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 19.

Yolima decoró una tarjeta de forma rectangular como la que se muestra en la figura, pegándole un hilo dorado por los cuatro bordes.



Figura

Yolima utilizó en total 40 cm de hilo dorado. ¿Cuántos centímetros de hilo dorado utilizó solamente para decorar los dos bordes largos de la tarjeta?

A. 8 cm.

B. 10 cm.

C. 24 cm.

D. 48 cm.

• Estructura

Competencia	Resolución
Componente	Espacial - métrico
Afirmación	Utilizar relaciones y propiedades geométricas para resolver problemas de medición.
Nivel de desempeño	Avanzado
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	22.0%	26.5%	30.7%	18.1%	2.8%	978
Antioquia	18.6%	25.4%	38.7%	15.2%	2.0%	29373
Apartadó	20.4%	27.4%	33.4%	15.9%	3.0%	1757
Arauca	16.8%	24.1%	41.6%	16.0%	1.5%	2680
Armenia	16.5%	27.4%	40.4%	14.1%	1.6%	2580
Atlántico	20.2%	24.7%	35.8%	15.6%	3.7%	5978
Barrancabermeja	18.0%	26.2%	40.2%	13.5%	2.1%	2488
Barranquilla	19.8%	27.2%	37.4%	14.0%	1.8%	12401
Bello	17.3%	27.0%	41.1%	13.0%	1.7%	3836
Bogotá, D.C.	14.9%	26.4%	44.2%	12.5%	2.0%	66877
Bolívar	23.4%	24.7%	31.6%	17.4%	2.8%	11163
Boyacá	16.7%	24.7%	43.9%	13.9%	0.8%	9265
Bucaramanga	13.6%	26.5%	46.3%	12.1%	1.4%	5300
Buenaventura	20.4%	24.0%	35.5%	16.7%	3.4%	4160
Buga	18.5%	27.1%	38.3%	14.3%	1.8%	1238
Caldas	19.1%	24.0%	39.0%	16.4%	1.5%	5750
Cali	17.4%	26.7%	40.3%	13.6%	2.0%	19641
Caquetá	20.5%	22.5%	38.2%	16.7%	2.1%	3265
Cartagena	21.2%	25.4%	37.8%	13.3%	2.2%	11457
Cartago	17.3%	28.5%	38.6%	13.6%	2.0%	1274
Casanare	17.6%	25.9%	40.1%	14.8%	1.5%	3072
Cauca	20.1%	21.7%	39.1%	16.3%	2.8%	12628
Cesar	22.1%	23.6%	37.8%	14.9%	1.6%	8483
Chocó	23.1%	20.7%	33.7%	19.5%	2.9%	3852
Chía	11.8%	26.5%	48.3%	11.8%	1.6%	1448
Ciénaga	23.2%	23.2%	35.0%	14.9%	3.7%	1516
Cundinamarca	14.8%	25.4%	45.2%	13.5%	1.2%	16374
Córdoba	22.8%	24.2%	33.8%	17.4%	1.8%	13351
Cúcuta	17.5%	25.9%	41.2%	14.0%	1.5%	7404
Dosquebradas	17.4%	26.9%	40.2%	13.5%	1.9%	1863
Duitama	11.6%	26.6%	51.1%	10.1%	0.6%	1408
Envigado	9.8%	25.9%	51.2%	11.9%	1.2%	1415
Facatativá	14.2%	26.4%	44.5%	14.0%	0.9%	1412
Florencia	19.2%	24.7%	39.6%	14.4%	2.1%	2075
Floridablanca	15.2%	25.9%	46.0%	11.8%	1.0%	2586
Fusagasugá	17.7%	25.7%	42.2%	12.5%	1.9%	1232
Girardot	18.3%	28.8%	36.9%	12.3%	3.7%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	16.5%	28.5%	42.4%	11.8%	0.8%	1523
Guainía	23.0%	23.4%	28.4%	22.2%	2.9%	517
Guaviare	18.7%	27.6%	35.2%	16.5%	2.0%	914
Huila	18.6%	24.2%	41.2%	15.2%	0.8%	8204
Ibagué	16.0%	25.1%	44.6%	12.9%	1.4%	5546
Ipiales	16.7%	24.8%	44.0%	13.4%	1.1%	1485
Itagüí	16.5%	30.2%	38.7%	12.7%	1.9%	2028
Jamundí	19.6%	29.0%	33.2%	16.7%	1.5%	1103
La Guajira	22.9%	21.6%	35.4%	17.4%	2.7%	3931
Lorica	21.6%	22.7%	37.8%	15.2%	2.7%	1541
Magangué	24.3%	23.8%	31.2%	19.0%	1.8%	1648
Magdalena	22.6%	22.7%	34.9%	16.8%	3.0%	9172
Maicao	23.3%	25.7%	31.6%	16.6%	2.8%	2162
Malambo	18.6%	24.3%	41.4%	13.8%	1.9%	1278
Manizales	15.5%	28.2%	41.3%	14.0%	1.0%	3145
Medellín	17.1%	29.6%	37.2%	14.1%	2.0%	20621
Meta	17.6%	25.3%	40.3%	15.1%	1.7%	6012
Montería	21.6%	27.1%	34.5%	15.1%	1.7%	5509
Mosquera	13.0%	26.6%	45.4%	12.8%	2.2%	1286
Nariño	18.3%	21.6%	42.9%	15.2%	2.0%	9299
Neiva	18.3%	26.9%	38.4%	14.9%	1.5%	3661
Norte de Santander	17.4%	23.3%	43.5%	14.3%	1.4%	8026
Palmira	16.5%	24.8%	41.5%	15.8%	1.4%	2836
Pasto	15.8%	27.3%	42.7%	13.1%	1.1%	4034
Pereira	16.0%	26.8%	41.6%	14.1%	1.5%	4349
Piedecuesta	11.7%	27.5%	47.2%	12.4%	1.1%	1481
Pitalito	20.0%	26.6%	37.8%	14.8%	0.8%	1582
Popayán	15.5%	26.3%	41.7%	14.8%	1.7%	3086
Putumayo	18.7%	24.6%	37.4%	16.9%	2.4%	4142
Quibdó	26.8%	21.1%	30.5%	17.9%	3.6%	1317
Quindío	18.1%	27.2%	38.0%	14.7%	2.0%	2449
Riohacha	22.0%	24.9%	32.4%	17.7%	3.1%	2582
Rionegro	14.3%	26.2%	47.1%	11.2%	1.3%	1185
Risaralda	18.4%	24.2%	40.1%	15.2%	2.0%	2810
Sabaneta	15.1%	27.0%	47.0%	9.8%	1.2%	511
Sahagún	18.1%	26.1%	35.7%	18.0%	2.1%	1213
San Andrés	21.8%	32.1%	33.0%	12.1%	1.1%	555
Santa Marta	20.8%	26.7%	36.0%	14.5%	2.0%	5826
Santander	15.7%	23.4%	46.6%	13.4%	0.9%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	20.5%	27.7%	35.7%	14.5%	1.6%	3217
Soacha	17.3%	29.2%	39.4%	12.5%	1.5%	5620
Sogamoso	13.4%	26.9%	46.6%	12.2%	0.9%	1503
Soledad	20.4%	25.8%	39.7%	12.4%	1.5%	5505
Sucre	22.4%	24.5%	33.6%	17.7%	1.7%	7730
Tolima	17.8%	23.7%	41.5%	15.2%	1.8%	9717
Tuluá	18.2%	26.3%	41.3%	12.9%	1.4%	2129
Tumaco	23.5%	24.2%	29.3%	18.6%	4.4%	2375
Tunja	11.9%	26.4%	48.7%	11.7%	1.2%	1871
Turbo	24.9%	26.3%	27.8%	18.2%	2.7%	2122
Uribia	23.4%	16.6%	31.4%	24.5%	4.1%	1095
Valle del Cauca	18.2%	25.1%	39.7%	15.6%	1.4%	8498
Valledupar	21.3%	24.4%	38.2%	14.8%	1.3%	5289
Vichada	20.2%	24.4%	30.3%	20.4%	4.7%	779
Villavicencio	15.1%	27.2%	43.0%	13.2%	1.6%	5786
Yopal	17.4%	28.2%	38.8%	13.5%	1.9%	2008
Yumbo	19.5%	28.9%	37.4%	12.6%	1.6%	1265
Zipaquirá	18.3%	25.7%	42.8%	12.4%	0.9%	1284
Colombia	18.2%	25.5%	39.9%	14.5%	1.9%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 20.

En un restaurante, a la hora del almuerzo sirven la gaseosa en vasos de la misma forma y tamaño. En la tabla se presenta la cantidad de gaseosa que sirven en 2, 3 y 4 vasos llenos.

Número de vasos	**Cantidad de gaseosa en centímetros cúbicos (cm^3)**
2	500
3	750
4	1.000
⋮	⋮

Tabla

¿Qué cantidad de gaseosa se necesita para llenar 7 vasos?

A. 1.250 cm^3.

B. 1.500 cm^3.

C. 1.750 cm^3.

D. 2.250 cm^3.

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver y formular problemas sencillos de proporcionalidad directa e inversa.
Nivel de desempeño	Avanzado
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	12.6%	22.1%	33.1%	28.3%	3.9%	978
Antioquia	12.4%	18.0%	39.3%	28.0%	2.3%	29373
Apartadó	12.7%	17.4%	41.4%	25.4%	3.1%	1757
Arauca	11.9%	16.9%	41.1%	28.1%	2.1%	2680
Armenia	12.2%	18.3%	40.0%	27.4%	2.1%	2580
Atlántico	13.5%	19.1%	38.0%	25.4%	4.0%	5978
Barrancabermeja	12.5%	16.2%	42.3%	26.8%	2.3%	2488
Barranquilla	13.1%	17.9%	39.3%	27.5%	2.2%	12401
Bello	12.4%	17.0%	41.2%	27.3%	2.1%	3836
Bogotá, D.C.	10.7%	15.7%	45.2%	26.1%	2.3%	66877
Bolívar	14.2%	21.2%	35.2%	26.1%	3.3%	11163
Boyacá	11.0%	17.9%	43.5%	26.6%	1.1%	9265
Bucaramanga	9.8%	14.8%	47.8%	25.9%	1.7%	5300
Buenaventura	13.4%	16.9%	39.9%	25.5%	4.2%	4160
Buga	11.1%	15.6%	42.6%	28.4%	2.3%	1238
Caldas	12.9%	17.0%	40.2%	28.2%	1.6%	5750
Cali	12.6%	16.5%	41.9%	26.6%	2.4%	19641
Caquetá	12.6%	20.2%	40.8%	24.1%	2.3%	3265
Cartagena	12.9%	17.8%	41.6%	25.1%	2.7%	11457
Cartago	11.9%	16.7%	38.8%	29.9%	2.7%	1274
Casanare	11.9%	17.8%	40.9%	27.4%	2.0%	3072
Cauca	12.2%	16.8%	41.7%	26.1%	3.2%	12628
Cesar	12.1%	19.4%	40.5%	25.9%	2.1%	8483
Chocó	12.7%	19.7%	37.6%	27.0%	3.0%	3852
Chía	9.7%	14.2%	46.6%	27.9%	1.7%	1448
Ciénaga	12.5%	18.7%	41.5%	22.9%	4.4%	1516
Cundinamarca	10.5%	15.3%	46.2%	26.4%	1.6%	16374
Córdoba	14.2%	20.4%	36.2%	26.8%	2.4%	13351
Cúcuta	12.5%	16.7%	42.0%	27.4%	1.5%	7404
Dosquebradas	12.0%	15.4%	42.0%	28.2%	2.4%	1863
Duitama	9.4%	12.7%	52.5%	24.6%	0.7%	1408
Envigado	11.8%	15.1%	47.3%	24.4%	1.4%	1415
Facatativá	10.8%	15.4%	45.1%	27.3%	1.4%	1412
Florencia	13.6%	17.1%	39.9%	27.4%	2.0%	2075
Floridablanca	10.9%	14.6%	49.1%	24.3%	1.1%	2586
Fusagasugá	13.6%	16.4%	41.4%	26.1%	2.4%	1232
Girardot	14.7%	14.9%	39.2%	27.4%	3.8%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	11.4%	19.3%	42.9%	25.3%	1.1%	1523
Guainía	12.4%	21.7%	32.9%	29.6%	3.5%	517
Guaviare	13.5%	18.4%	37.7%	27.8%	2.6%	914
Huila	11.2%	17.1%	42.4%	28.1%	1.2%	8204
Ibagué	10.9%	15.3%	45.9%	26.3%	1.6%	5546
Ipiales	12.5%	18.7%	42.0%	25.1%	1.6%	1485
Itagüí	13.9%	19.4%	39.5%	25.2%	2.0%	2028
Jamundí	15.1%	19.1%	36.1%	27.4%	2.3%	1103
La Guajira	11.8%	19.6%	40.8%	25.0%	2.8%	3931
Lorica	13.4%	18.7%	40.3%	24.6%	3.0%	1541
Magangué	15.2%	21.1%	35.3%	26.1%	2.2%	1648
Magdalena	12.8%	19.2%	38.5%	26.0%	3.5%	9172
Maicao	14.0%	21.2%	36.3%	25.0%	3.5%	2162
Malambo	13.1%	16.0%	45.6%	22.5%	2.7%	1278
Manizales	10.8%	15.8%	43.5%	28.4%	1.5%	3145
Medellín	14.3%	19.1%	38.2%	26.1%	2.3%	20621
Meta	12.5%	18.5%	40.1%	26.5%	2.4%	6012
Montería	13.5%	19.6%	36.9%	28.1%	1.9%	5509
Mosquera	10.7%	16.3%	45.3%	25.0%	2.6%	1286
Nariño	10.5%	16.2%	45.2%	25.6%	2.6%	9299
Neiva	11.7%	16.1%	41.7%	28.6%	1.9%	3661
Norte de Santander	10.6%	17.1%	45.3%	25.4%	1.7%	8026
Palmira	11.2%	15.2%	41.7%	30.0%	1.8%	2836
Pasto	11.3%	16.9%	42.7%	27.6%	1.5%	4034
Pereira	10.8%	16.8%	41.7%	28.6%	2.1%	4349
Piedecuesta	10.6%	14.7%	48.0%	25.1%	1.6%	1481
Pitalito	12.8%	17.0%	43.8%	25.5%	0.9%	1582
Popayán	10.4%	14.8%	44.6%	28.3%	1.9%	3086
Putumayo	13.2%	19.1%	38.0%	27.1%	2.6%	4142
Quibdó	14.0%	18.8%	37.9%	25.5%	3.8%	1317
Quindío	12.5%	18.3%	39.7%	27.0%	2.4%	2449
Riohacha	13.2%	20.3%	38.0%	24.9%	3.7%	2582
Rionegro	11.1%	16.5%	42.9%	28.0%	1.4%	1185
Risaralda	11.7%	16.7%	40.2%	29.1%	2.3%	2810
Sabaneta	12.1%	13.3%	44.8%	28.0%	1.8%	511
Sahagún	12.9%	20.8%	35.6%	28.0%	2.7%	1213
San Andrés	16.4%	17.7%	35.0%	29.4%	1.6%	555
Santa Marta	12.6%	19.1%	40.6%	25.2%	2.5%	5826
Santander	10.5%	15.6%	46.3%	26.5%	1.2%	8664

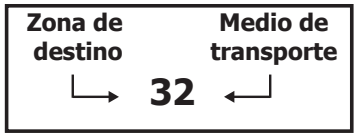
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	12.9%	20.9%	39.3%	25.3%	1.6%	3217
Soacha	11.9%	18.0%	41.5%	26.6%	2.0%	5620
Sogamoso	11.3%	15.8%	46.6%	25.4%	0.9%	1503
Soledad	12.0%	17.4%	43.1%	25.4%	2.1%	5505
Sucre	14.0%	20.2%	36.2%	27.8%	1.8%	7730
Tolima	11.3%	16.9%	42.0%	27.6%	2.1%	9717
Tuluá	10.9%	16.3%	42.5%	28.3%	2.0%	2129
Tumaco	14.9%	23.3%	32.0%	24.7%	5.0%	2375
Tunja	11.5%	16.8%	45.9%	24.4%	1.4%	1871
Turbo	14.3%	21.3%	34.4%	26.9%	3.2%	2122
Uribia	13.7%	21.4%	32.8%	26.2%	5.9%	1095
Valle del Cauca	12.1%	16.3%	41.3%	28.2%	2.1%	8498
Valledupar	12.3%	16.6%	40.7%	28.7%	1.8%	5289
Vichada	14.9%	20.5%	31.2%	28.9%	4.5%	779
Villavicencio	11.3%	15.6%	44.7%	26.2%	2.2%	5786
Yopal	12.8%	17.1%	41.8%	25.5%	2.7%	2008
Yumbo	10.8%	18.0%	39.4%	30.4%	1.4%	1265
Zipaquirá	9.9%	16.0%	47.3%	25.5%	1.4%	1284
Colombia	12.1%	17.4%	41.6%	26.6%	2.3%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 21.

Los tiquetes utilizados en una terminal de transporte tienen códigos de dos cifras.
La primera cifra indica la zona de destino y la segunda, el medio de transporte.



En la tabla 1 se indican las cifras que corresponden a cada zona y en la 2, las cifras que corresponden a cada medio de transporte.

Zona de destino	Primera cifra
Centro	1
Sur	2
Norte	3

Tabla 1

Medio de transporte	Segunda cifra
Bus	1
Buseta	2
Colectivo	3

Tabla 2

Una persona compra un tiquete para viajar al sur en bus. ¿Con cuál de los siguientes códigos está marcado su tiquete?

A. 11
B. 13
C. 21
D. 23

• Estructura

Competencia	Comunicación
Componente	Numérico - variacional
Afirmación	Reconocer e interpretar números naturales y fracciones en diferentes contextos.
Nivel de desempeño	Avanzado
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	19.4%	24.0%	33.7%	18.4%	4.4%	978
Antioquia	21.4%	20.8%	40.9%	14.5%	2.4%	29373
Apartadó	21.6%	21.5%	38.5%	15.3%	3.1%	1757
Arauca	19.5%	21.6%	42.1%	14.8%	2.0%	2680
Armenia	21.5%	21.9%	42.4%	12.2%	2.0%	2580
Atlántico	21.9%	21.3%	36.3%	16.3%	4.3%	5978
Barrancabermeja	19.5%	21.2%	43.9%	13.0%	2.5%	2488
Barranquilla	20.8%	21.9%	40.9%	14.1%	2.3%	12401
Bello	19.7%	18.7%	47.4%	12.2%	2.0%	3836
Bogotá, D.C.	19.0%	19.9%	47.4%	11.2%	2.5%	66877
Bolívar	22.6%	23.5%	32.3%	17.8%	3.7%	11163
Boyacá	22.2%	22.3%	40.9%	13.5%	1.1%	9265
Bucaramanga	19.0%	20.3%	48.0%	10.9%	1.7%	5300
Buenaventura	21.8%	19.0%	39.8%	15.3%	4.0%	4160
Buga	21.2%	20.4%	42.6%	13.5%	2.4%	1238
Caldas	21.1%	22.2%	40.5%	14.3%	1.8%	5750
Cali	20.9%	20.0%	44.5%	12.0%	2.6%	19641
Caquetá	21.7%	22.8%	39.0%	14.2%	2.3%	3265
Cartagena	21.1%	19.8%	42.3%	14.0%	2.7%	11457
Cartago	21.1%	19.8%	44.0%	12.5%	2.6%	1274
Casanare	21.7%	23.4%	39.7%	13.1%	2.1%	3072
Cauca	19.8%	20.0%	43.0%	13.9%	3.4%	12628
Cesar	21.4%	21.4%	38.9%	16.1%	2.1%	8483
Chocó	22.2%	20.2%	35.9%	18.3%	3.5%	3852
Chía	18.1%	20.1%	48.8%	10.9%	2.1%	1448
Ciénaga	21.2%	19.7%	39.9%	14.5%	4.7%	1516
Cundinamarca	19.6%	20.9%	46.0%	12.0%	1.6%	16374
Córdoba	22.4%	23.0%	34.9%	17.1%	2.5%	13351
Cúcuta	20.9%	23.8%	41.1%	12.4%	1.8%	7404
Dosquebradas	22.0%	21.3%	42.8%	11.5%	2.5%	1863
Duitama	17.5%	18.3%	52.5%	10.9%	0.9%	1408
Envigado	17.5%	18.4%	52.2%	10.1%	1.8%	1415
Facatativá	18.7%	20.1%	47.8%	12.0%	1.3%	1412
Florencia	21.4%	24.0%	38.5%	13.9%	2.2%	2075
Floridablanca	18.9%	20.4%	47.4%	11.9%	1.4%	2586
Fusagasugá	19.6%	22.3%	44.7%	10.9%	2.4%	1232

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girardot	21.8%	19.7%	42.0%	12.7%	3.8%	895
Girón	21.7%	22.3%	40.3%	13.7%	2.0%	1523
Guainía	23.4%	21.9%	36.6%	14.7%	3.5%	517
Guaviare	22.4%	21.6%	39.1%	15.0%	2.0%	914
Huila	21.7%	22.4%	41.1%	13.5%	1.3%	8204
Ibagué	19.8%	20.1%	46.6%	11.9%	1.6%	5546
Ipiales	20.9%	21.0%	46.3%	10.7%	1.1%	1485
Itagüí	21.5%	21.4%	42.4%	12.4%	2.2%	2028
Jamundí	22.8%	22.1%	37.5%	14.8%	2.7%	1103
La Guajira	20.6%	21.5%	38.6%	16.4%	2.9%	3931
Lorica	20.6%	21.2%	39.5%	15.5%	3.1%	1541
Magangué	21.7%	23.7%	34.4%	17.6%	2.5%	1648
Magdalena	20.7%	21.0%	37.3%	17.3%	3.7%	9172
Maicao	22.7%	23.4%	33.4%	17.0%	3.5%	2162
Malambo	21.0%	18.9%	42.9%	14.5%	2.8%	1278
Manizales	20.6%	21.7%	44.9%	11.3%	1.5%	3145
Medellín	21.1%	21.7%	40.4%	14.3%	2.4%	20621
Meta	20.8%	22.6%	38.9%	15.3%	2.5%	6012
Montería	23.0%	23.5%	36.1%	15.3%	2.1%	5509
Mosquera	18.0%	22.0%	45.8%	11.6%	2.6%	1286
Nariño	20.2%	19.3%	45.4%	12.5%	2.6%	9299
Neiva	21.4%	23.9%	39.9%	13.0%	1.8%	3661
Norte de Santander	20.6%	20.6%	44.3%	12.8%	1.6%	8026
Palmira	21.0%	18.6%	45.9%	12.6%	1.9%	2836
Pasto	22.3%	21.0%	43.5%	11.7%	1.5%	4034
Pereira	20.9%	20.6%	43.8%	12.5%	2.2%	4349
Piedecuesta	19.2%	21.0%	46.2%	12.0%	1.6%	1481
Pitalito	21.0%	24.5%	39.3%	14.0%	1.2%	1582
Popayán	17.9%	20.5%	45.9%	13.6%	2.2%	3086
Putumayo	21.6%	21.8%	39.7%	14.1%	2.8%	4142
Quibdó	24.6%	19.6%	37.2%	14.9%	3.7%	1317
Quindío	21.7%	21.7%	39.4%	14.6%	2.6%	2449
Riohacha	22.8%	22.2%	35.6%	15.8%	3.6%	2582
Rionegro	19.1%	22.4%	44.4%	12.2%	1.9%	1185
Risaralda	20.7%	21.6%	40.7%	14.1%	2.9%	2810
Sabaneta	16.6%	20.0%	51.7%	10.4%	1.4%	511
Sahagún	20.9%	23.3%	37.6%	15.7%	2.5%	1213
San Andrés	24.5%	23.8%	35.7%	13.5%	2.5%	555
Santa Marta	21.6%	21.5%	39.5%	14.5%	2.8%	5826

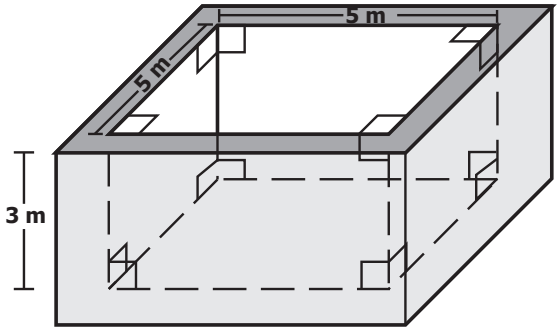
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Santander	21.2%	20.2%	45.2%	12.2%	1.2%	8664
Sincelejo	21.3%	22.8%	39.4%	15.0%	1.6%	3217
Soacha	20.1%	20.9%	44.2%	12.7%	2.1%	5620
Sogamoso	21.4%	20.3%	46.4%	10.6%	1.3%	1503
Soledad	20.4%	19.3%	44.8%	13.4%	2.2%	5505
Sucre	22.6%	22.9%	34.2%	18.1%	2.2%	7730
Tolima	21.0%	20.9%	40.9%	14.8%	2.4%	9717
Tuluá	22.6%	20.4%	42.8%	12.9%	1.3%	2129
Tumaco	22.6%	23.2%	30.3%	19.0%	4.9%	2375
Tunja	19.6%	21.3%	47.1%	10.5%	1.5%	1871
Turbo	22.2%	23.8%	32.2%	18.5%	3.3%	2122
Uribia	20.9%	22.1%	32.5%	19.7%	4.7%	1095
Valle del Cauca	21.3%	21.6%	41.1%	14.1%	1.8%	8498
Valledupar	20.7%	20.6%	42.4%	14.5%	1.9%	5289
Vichada	21.4%	23.7%	33.2%	16.8%	4.7%	779
Villavicencio	20.7%	20.5%	43.6%	13.3%	1.8%	5786
Yopal	19.9%	23.1%	40.3%	14.4%	2.3%	2008
Yumbo	21.6%	22.8%	40.9%	12.6%	2.1%	1265
Zipaquirá	18.0%	21.0%	47.7%	11.5%	1.7%	1284
Colombia	20.8%	21.1%	42.0%	13.7%	2.4%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 22.

Adela quiere saber cuánta agua cabe en una piscina que tiene la forma y las medidas indicadas en la figura.



Los ángulos señalados en la figura son rectos.

Figura

¿Cuál o cuáles de los siguientes procedimientos le sirve(n) a Adela para calcular cuánta agua, en m^3, cabe en la piscina?

I.	5 X 5 X 3
II.	6 X 7 X 3
III.	3 + 7 + 5 + 5 + 6

A. I solamente.
B. II solamente.
C. I y III solamente.
D. II y III solamente.

• Estructura

Competencia	Razonamiento
Componente	Espacial - métrico
Afirmación	Justificar relaciones de semejanza y congruencia entre figuras.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	33.1%	21.8%	18.6%	23.1%	3.4%	978
Antioquia	44.7%	18.9%	16.7%	17.5%	2.2%	29373
Apartadó	40.8%	17.9%	18.4%	19.7%	3.1%	1757
Arauca	46.4%	18.1%	17.1%	16.7%	1.8%	2680
Armenia	47.5%	19.3%	15.5%	15.9%	1.8%	2580
Atlántico	39.9%	18.3%	18.1%	19.5%	4.3%	5978
Barrancabermeja	45.9%	18.2%	16.0%	17.5%	2.4%	2488
Barranquilla	45.1%	19.0%	16.8%	17.0%	2.1%	12401
Bello	48.5%	18.8%	15.8%	15.2%	1.7%	3836
Bogotá, D.C.	49.1%	18.1%	15.4%	15.0%	2.4%	66877
Bolívar	38.0%	19.3%	19.0%	20.6%	3.1%	11163
Boyacá	47.5%	18.8%	16.6%	16.1%	1.0%	9265
Bucaramanga	49.6%	18.3%	15.7%	14.8%	1.6%	5300
Buenaventura	43.7%	18.5%	15.9%	18.0%	3.9%	4160
Buga	47.8%	16.8%	16.9%	16.3%	2.2%	1238
Caldas	46.2%	18.8%	16.9%	16.6%	1.5%	5750
Cali	46.9%	18.5%	16.4%	15.8%	2.4%	19641
Caquetá	43.6%	19.8%	17.2%	17.3%	2.0%	3265
Cartagena	44.2%	18.2%	17.7%	17.3%	2.7%	11457
Cartago	48.0%	16.8%	15.9%	17.0%	2.2%	1274
Casanare	43.8%	19.5%	17.0%	17.7%	2.1%	3072
Cauca	46.9%	17.1%	16.6%	16.4%	3.1%	12628
Cesar	43.7%	18.5%	17.2%	18.6%	1.9%	8483
Chocó	41.5%	18.2%	17.7%	19.4%	3.3%	3852
Chía	50.1%	18.5%	15.3%	14.6%	1.5%	1448
Ciénaga	40.5%	20.1%	16.2%	18.5%	4.7%	1516
Cundinamarca	49.6%	17.7%	15.9%	15.3%	1.5%	16374
Córdoba	39.5%	19.2%	19.0%	20.4%	2.0%	13351
Cúcuta	46.4%	18.5%	16.8%	16.6%	1.7%	7404
Dosquebradas	47.1%	19.5%	17.4%	13.7%	2.2%	1863
Duitama	55.3%	14.6%	13.5%	15.6%	1.1%	1408
Envigado	51.9%	17.4%	15.8%	13.4%	1.5%	1415
Facatativá	50.9%	16.9%	14.8%	16.4%	1.0%	1412
Florencia	44.5%	20.0%	17.0%	16.8%	1.7%	2075
Floridablanca	51.2%	16.8%	15.5%	15.4%	1.1%	2586
Fusagasugá	48.6%	18.5%	15.2%	15.0%	2.7%	1232
Girardot	44.2%	19.7%	16.9%	15.4%	3.8%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	43.8%	18.4%	19.0%	17.4%	1.4%	1523
Guainía	37.1%	21.9%	18.2%	19.0%	3.9%	517
Guaviare	40.7%	20.0%	18.6%	18.4%	2.3%	914
Huila	46.9%	17.9%	16.8%	17.2%	1.2%	8204
Ibagué	48.5%	18.7%	16.0%	15.5%	1.4%	5546
Ipiales	48.4%	15.8%	18.2%	16.6%	1.0%	1485
Itagüí	43.4%	19.3%	16.7%	18.8%	1.7%	2028
Jamundí	42.9%	21.1%	17.5%	16.6%	1.9%	1103
La Guajira	41.8%	18.8%	16.2%	20.4%	2.8%	3931
Lorica	43.0%	18.4%	18.0%	17.5%	3.0%	1541
Magangué	38.0%	18.3%	21.7%	19.7%	2.4%	1648
Magdalena	40.4%	18.9%	18.1%	19.2%	3.4%	9172
Maicao	36.4%	21.9%	18.6%	20.1%	3.0%	2162
Malambo	46.2%	17.3%	17.3%	16.7%	2.6%	1278
Manizales	48.9%	18.2%	14.9%	16.6%	1.5%	3145
Medellín	42.4%	19.9%	18.0%	17.7%	2.0%	20621
Meta	43.4%	19.1%	18.7%	16.8%	2.0%	6012
Montería	40.5%	20.2%	18.2%	19.3%	1.7%	5509
Mosquera	50.4%	18.6%	15.4%	13.1%	2.5%	1286
Nariño	50.5%	17.2%	15.1%	14.9%	2.3%	9299
Neiva	45.8%	18.5%	17.4%	16.3%	2.0%	3661
Norte de Santander	49.8%	18.1%	15.1%	15.5%	1.6%	8026
Palmira	48.8%	18.8%	15.2%	15.7%	1.5%	2836
Pasto	50.7%	18.2%	15.3%	14.4%	1.4%	4034
Pereira	48.3%	18.9%	15.9%	14.9%	2.1%	4349
Piedecuesta	48.4%	16.8%	18.2%	15.1%	1.5%	1481
Pitalito	44.6%	20.2%	17.3%	16.8%	1.2%	1582
Popayán	50.5%	17.1%	14.8%	15.4%	2.3%	3086
Putumayo	43.0%	18.6%	17.4%	18.3%	2.7%	4142
Quibdó	38.2%	19.2%	17.5%	21.6%	3.6%	1317
Quindío	43.0%	20.3%	16.5%	18.0%	2.2%	2449
Riohacha	42.3%	19.1%	17.8%	17.8%	3.0%	2582
Rionegro	50.5%	18.2%	16.2%	13.5%	1.6%	1185
Risaralda	46.4%	18.2%	16.7%	16.5%	2.2%	2810
Sabaneta	51.5%	16.2%	15.7%	15.7%	1.0%	511
Sahagún	40.0%	21.7%	18.3%	17.9%	2.1%	1213
San Andrés	39.1%	19.3%	20.4%	19.8%	1.4%	555
Santa Marta	43.9%	18.9%	17.4%	17.5%	2.3%	5826
Santander	50.5%	16.6%	16.0%	15.9%	1.1%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	43.5%	18.6%	18.0%	18.6%	1.3%	3217
Soacha	45.8%	18.3%	17.1%	16.9%	2.0%	5620
Sogamoso	51.1%	18.4%	15.0%	14.6%	0.9%	1503
Soledad	46.4%	18.5%	17.1%	16.1%	1.9%	5505
Sucre	40.2%	19.9%	18.7%	19.5%	1.7%	7730
Tolima	45.8%	18.2%	16.2%	17.7%	2.1%	9717
Tuluá	47.1%	18.6%	17.2%	15.4%	1.6%	2129
Tumaco	35.7%	19.1%	19.5%	20.9%	4.8%	2375
Tunja	52.0%	17.4%	15.1%	14.3%	1.2%	1871
Turbo	35.8%	18.9%	21.1%	21.4%	2.9%	2122
Uribia	36.2%	18.4%	18.2%	22.6%	4.6%	1095
Valle del Cauca	46.4%	18.4%	16.3%	17.2%	1.8%	8498
Valledupar	47.4%	17.9%	15.7%	17.4%	1.6%	5289
Vichada	32.3%	19.6%	22.1%	21.4%	4.5%	779
Villavicencio	45.8%	19.3%	16.3%	16.6%	1.9%	5786
Yopal	42.4%	19.5%	18.4%	17.3%	2.4%	2008
Yumbo	45.7%	19.9%	15.4%	17.1%	1.9%	1265
Zipaquirá	55.1%	16.0%	13.7%	14.3%	0.9%	1284
Colombia	45.7%	18.5%	16.7%	16.9%	2.2%	497501

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 23.

Los dueños de un supermercado ofrecen la siguiente promoción:

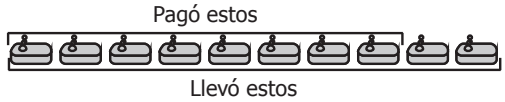
PROMOCIÓN:
PAGUE 3 JABONES Y LLEVE 5

Una persona llevó 10 jabones de la promoción. ¿En cuál de las siguientes gráficas se representa correctamente la cantidad de jabones que pagó y que llevó esta persona?

A.

B.

C.

D.


• Estructura

Competencia	Comunicación
Componente	Aleatorio
Afirmación	Representar gráficamente un conjunto de datos e interpretar representaciones gráficas.
Nivel de desempeño	Mínimo
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	17.2%	23.1%	20.4%	36.7%	2.6%	978
Antioquia	12.7%	16.5%	14.8%	54.6%	1.2%	29375
Apartadó	11.7%	15.2%	14.9%	56.0%	2.2%	1757
Arauca	10.4%	13.7%	11.7%	63.5%	0.7%	2680
Armenia	9.5%	13.6%	12.7%	63.6%	0.7%	2579
Atlántico	13.5%	18.3%	16.5%	49.4%	2.3%	5977
Barrancabermeja	11.0%	15.2%	12.7%	60.2%	1.0%	2488
Barranquilla	10.3%	15.5%	13.4%	60.0%	0.9%	12401
Bello	9.3%	13.2%	12.7%	63.9%	0.8%	3838
Bogotá, D.C.	8.7%	12.0%	10.5%	68.0%	0.7%	66881
Bolívar	16.0%	21.3%	18.6%	41.9%	2.2%	11164
Boyacá	11.0%	13.5%	12.4%	62.6%	0.6%	9267
Bucaramanga	7.8%	10.4%	9.8%	71.3%	0.7%	5302
Buenaventura	14.5%	16.7%	16.2%	50.4%	2.1%	4159
Buga	8.7%	13.3%	12.0%	65.1%	0.8%	1238
Caldas	10.9%	14.6%	14.0%	59.9%	0.6%	5750
Cali	9.8%	13.3%	11.3%	64.5%	1.0%	19640
Caquetá	14.2%	18.0%	17.5%	49.2%	1.1%	3262
Cartagena	12.3%	16.7%	14.7%	54.9%	1.4%	11456
Cartago	10.0%	16.4%	12.3%	60.3%	0.9%	1274
Casanare	10.9%	15.0%	12.5%	61.2%	0.5%	3072
Cauca	15.9%	16.3%	14.9%	51.2%	1.6%	12625
Cesar	13.1%	17.3%	16.2%	52.4%	1.0%	8484
Chocó	17.7%	19.7%	18.1%	42.2%	2.3%	3850
Chía	7.8%	10.8%	11.1%	69.9%	0.3%	1448
Ciénaga	15.5%	19.0%	18.3%	45.3%	1.8%	1515
Cundinamarca	8.3%	12.1%	11.0%	68.1%	0.6%	16373
Córdoba	15.4%	21.1%	18.7%	43.7%	1.1%	13353
Cúcuta	9.0%	12.8%	11.7%	66.0%	0.6%	7403
Dosquebradas	9.9%	14.3%	11.9%	63.3%	0.6%	1863
Duitama	6.6%	9.1%	8.4%	75.8%	0.1%	1408
Envigado	8.3%	11.1%	11.6%	68.6%	0.4%	1415
Facatativá	7.4%	11.2%	9.1%	71.9%	0.4%	1412
Florencia	12.4%	15.5%	14.8%	56.7%	0.6%	2074
Floridablanca	8.1%	11.0%	9.7%	70.8%	0.4%	2586
Fusagasugá	7.1%	10.8%	9.3%	71.8%	0.9%	1232
Girardot	11.2%	13.0%	10.9%	62.6%	2.3%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	10.6%	13.7%	12.7%	62.6%	0.3%	1523
Guainía	18.6%	17.8%	14.5%	46.4%	2.7%	517
Guaviare	12.3%	16.6%	15.1%	54.6%	1.4%	914
Huila	11.2%	13.7%	13.4%	61.2%	0.5%	8206
Ibagué	7.7%	11.9%	10.3%	69.6%	0.5%	5546
Ipiales	8.5%	13.5%	8.6%	69.2%	0.3%	1485
Itagüí	8.9%	15.6%	13.9%	60.7%	0.9%	2026
Jamundí	12.2%	20.1%	14.1%	52.5%	1.1%	1103
La Guajira	14.3%	19.0%	17.4%	47.7%	1.6%	3931
Lorica	13.4%	19.7%	15.4%	50.3%	1.3%	1541
Magangué	15.8%	19.8%	16.1%	47.1%	1.1%	1648
Magdalena	15.7%	20.8%	17.2%	44.4%	1.9%	9170
Maicao	13.1%	19.2%	16.3%	49.8%	1.5%	2162
Malambo	13.1%	17.8%	13.3%	54.5%	1.3%	1277
Manizales	8.6%	12.0%	11.7%	67.2%	0.4%	3144
Medellín	10.8%	17.0%	13.7%	57.5%	1.0%	20616
Meta	10.9%	15.9%	14.4%	57.9%	0.9%	6010
Montería	12.8%	18.9%	15.4%	52.0%	0.9%	5508
Mosquera	8.0%	9.9%	10.0%	71.8%	0.4%	1286
Nariño	12.1%	14.0%	12.9%	59.4%	1.5%	9300
Neiva	9.6%	14.1%	11.1%	64.8%	0.4%	3659
Norte de Santander	11.0%	13.6%	12.4%	62.3%	0.7%	8026
Palmira	7.5%	12.3%	10.0%	69.6%	0.5%	2836
Pasto	8.5%	11.6%	9.8%	69.6%	0.5%	4034
Pereira	9.8%	12.8%	12.0%	64.8%	0.6%	4350
Piedecuesta	9.7%	12.6%	10.7%	66.3%	0.7%	1482
Pitalito	10.6%	13.9%	12.9%	61.9%	0.6%	1584
Popayán	8.2%	12.4%	11.2%	67.6%	0.6%	3086
Putumayo	11.4%	17.0%	14.4%	55.8%	1.4%	4143
Quibdó	13.9%	17.8%	16.6%	50.0%	1.7%	1323
Quindío	11.4%	14.8%	13.7%	59.1%	1.0%	2449
Riohacha	13.1%	21.1%	17.5%	46.7%	1.6%	2582
Rionegro	8.1%	13.4%	10.2%	67.4%	0.8%	1185
Risaralda	12.0%	14.4%	13.0%	59.4%	1.2%	2810
Sabaneta	8.4%	13.5%	14.1%	64.0%	0.0%	511
Sahagún	12.5%	17.6%	13.1%	54.9%	1.8%	1213
San Andrés	9.0%	19.6%	14.2%	56.2%	0.9%	555
Santa Marta	11.9%	17.4%	14.3%	55.4%	1.0%	5823
Santander	10.7%	13.3%	12.5%	63.1%	0.5%	8664

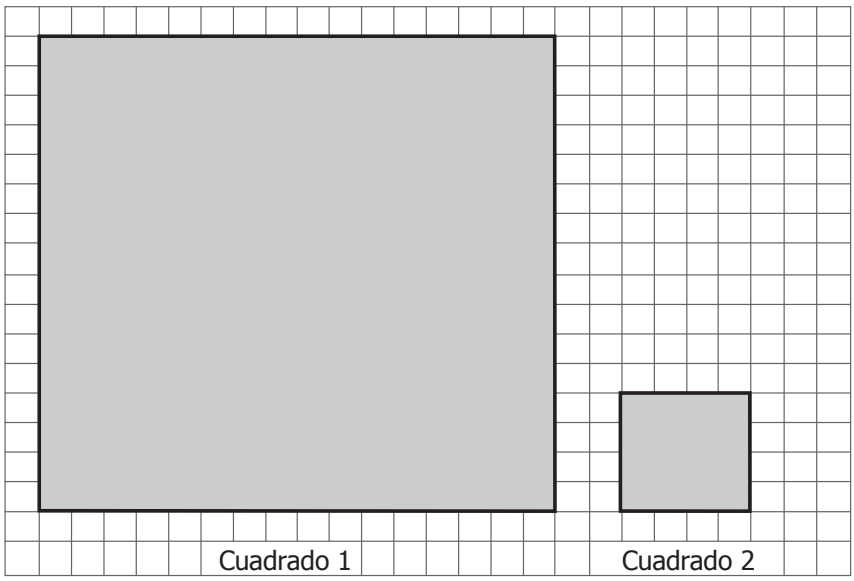
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	10.5%	16.6%	14.5%	57.6%	0.7%	3218
Soacha	9.7%	13.9%	12.0%	63.9%	0.5%	5620
Sogamoso	5.9%	12.1%	7.5%	74.4%	0.1%	1503
Soledad	10.2%	14.7%	13.5%	60.6%	1.0%	5507
Sucre	15.5%	19.6%	17.0%	46.7%	1.2%	7731
Tolima	11.3%	15.6%	14.3%	57.8%	1.0%	9719
Tuluá	8.6%	12.8%	12.7%	65.5%	0.3%	2129
Tumaco	18.4%	23.8%	21.0%	34.4%	2.4%	2376
Tunja	7.1%	9.7%	9.4%	73.5%	0.4%	1871
Turbo	16.5%	20.3%	19.8%	42.1%	1.3%	2122
Uribia	19.0%	22.6%	21.6%	34.1%	2.8%	1095
Valle del Cauca	11.1%	14.9%	13.6%	59.9%	0.6%	8500
Valledupar	10.9%	14.2%	13.6%	60.3%	1.0%	5289
Vichada	17.1%	18.1%	17.2%	44.2%	3.5%	779
Villavicencio	9.0%	13.9%	10.9%	65.7%	0.6%	5786
Yopal	11.9%	15.1%	11.5%	60.9%	0.7%	2008
Yumbo	11.1%	15.3%	12.0%	61.3%	0.3%	1265
Zipaquirá	8.6%	10.4%	9.5%	71.0%	0.5%	1284
Colombia	11.2%	15.1%	13.4%	59.3%	1.0%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

- **Pregunta 24.**

Observa los siguientes cuadrados. El lado del cuadrado 2 mide la cuarta parte del lado del cuadrado 1.



Figura

El área del cuadrado 2 es

A. igual al área del cuadrado 1.

B. el doble del área del cuadrado 1.

C. $\frac{1}{8}$ del área del cuadrado 1.

D. $\frac{1}{16}$ del área del cuadrado 1.

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver y formular problemas multiplicativos rutinarios y no rutinarios de adición repetida, factor multiplicante, razón y producto cartesiano.
Nivel de desempeño	Mínimo
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	9.5%	12.3%	13.2%	62.4%	2.7%	978
Antioquia	6.3%	8.1%	10.4%	73.6%	1.6%	29375
Apartadó	6.9%	8.3%	11.2%	70.9%	2.7%	1757
Arauca	5.9%	7.7%	9.4%	75.7%	1.3%	2680
Armenia	7.1%	8.6%	10.5%	73.1%	0.8%	2579
Atlántico	7.8%	10.3%	11.6%	67.8%	2.5%	5977
Barrancabermeja	6.4%	8.0%	10.9%	73.2%	1.6%	2488
Barranquilla	7.0%	8.6%	10.5%	72.9%	1.0%	12401
Bello	6.0%	7.5%	10.9%	74.6%	1.0%	3838
Bogotá, D.C.	5.0%	6.5%	8.8%	78.8%	0.9%	66881
Bolívar	9.1%	11.5%	13.3%	63.6%	2.5%	11164
Boyacá	4.5%	6.2%	8.6%	79.8%	0.8%	9267
Bucaramanga	4.4%	6.1%	8.3%	80.4%	0.9%	5302
Buenaventura	7.4%	10.1%	11.0%	68.9%	2.6%	4159
Buga	7.9%	6.9%	9.5%	74.6%	1.1%	1238
Caldas	5.4%	7.4%	9.4%	77.1%	0.7%	5750
Cali	6.7%	8.0%	9.8%	74.2%	1.3%	19640
Caquetá	5.5%	8.2%	11.2%	73.5%	1.6%	3262
Cartagena	7.4%	9.8%	11.3%	69.8%	1.7%	11456
Cartago	6.1%	7.3%	10.1%	75.7%	0.8%	1274
Casanare	5.7%	7.2%	9.2%	76.9%	1.1%	3072
Cauca	5.6%	7.3%	9.4%	75.7%	1.9%	12625
Cesar	7.0%	8.4%	10.8%	72.4%	1.4%	8484
Chocó	8.7%	11.7%	12.0%	65.2%	2.4%	3850

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Chía	5.5%	5.9%	9.5%	78.5%	0.5%	1448
Ciénaga	8.3%	9.8%	11.0%	68.6%	2.2%	1515
Cundinamarca	4.7%	6.0%	8.1%	80.5%	0.6%	16373
Córdoba	8.3%	11.3%	13.7%	65.1%	1.5%	13353
Cúcuta	5.0%	7.2%	8.8%	78.1%	0.8%	7403
Dosquebradas	5.2%	6.8%	8.1%	79.0%	0.9%	1863
Duitama	3.6%	5.0%	7.0%	84.1%	0.3%	1408
Envigado	7.2%	7.5%	8.7%	76.0%	0.6%	1415
Facatativá	4.1%	5.3%	7.2%	82.8%	0.6%	1412
Florencia	5.9%	7.8%	9.4%	75.8%	1.1%	2074
Floridablanca	5.2%	6.2%	8.3%	79.8%	0.4%	2586
Fusagasugá	3.8%	5.8%	9.3%	80.1%	1.0%	1232
Girardot	7.7%	7.7%	10.9%	71.5%	2.1%	895
Girón	6.5%	7.9%	10.4%	74.3%	1.0%	1523
Guainía	6.8%	8.9%	10.8%	70.8%	2.7%	517
Guaviare	5.9%	7.2%	10.9%	74.3%	1.6%	914
Huila	4.8%	6.5%	8.5%	79.5%	0.7%	8206
Ibagué	4.6%	6.7%	8.3%	79.6%	0.8%	5546
Ipiales	4.8%	5.6%	7.1%	81.8%	0.7%	1485
Itagüí	7.3%	9.4%	11.9%	70.2%	1.1%	2026
Jamundí	8.6%	10.7%	12.6%	66.8%	1.3%	1103
La Guajira	8.0%	10.8%	11.4%	67.6%	2.2%	3931
Lorica	6.7%	10.0%	13.0%	68.9%	1.4%	1541
Magangué	7.6%	9.8%	13.8%	66.8%	1.9%	1648
Magdalena	7.9%	10.5%	11.7%	67.4%	2.5%	9170
Maicao	7.5%	10.9%	13.6%	65.8%	2.2%	2162
Malambo	6.2%	10.3%	9.1%	72.9%	1.6%	1277
Manizales	4.2%	6.4%	7.5%	81.2%	0.6%	3144
Medellín	7.8%	9.4%	12.0%	69.5%	1.3%	20616
Meta	6.4%	7.4%	9.5%	75.4%	1.3%	6010
Montería	7.9%	10.0%	12.5%	68.4%	1.2%	5508
Mosquera	3.7%	5.1%	8.2%	82.4%	0.6%	1286
Nariño	4.8%	6.7%	8.3%	78.7%	1.6%	9300
Neiva	5.5%	7.1%	9.0%	77.7%	0.7%	3659
Norte de Santander	5.3%	6.3%	8.6%	78.9%	0.8%	8026
Palmira	4.8%	7.4%	9.0%	78.2%	0.6%	2836
Pasto	4.2%	5.6%	7.1%	82.3%	0.8%	4034
Pereira	5.2%	6.6%	9.1%	78.3%	0.9%	4350
Piedecuesta	6.4%	6.5%	9.2%	76.9%	0.9%	1482

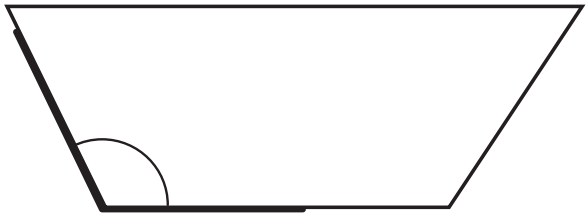
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Pitalito	5.8%	6.1%	9.3%	78.1%	0.7%	1584
Popayán	5.1%	5.3%	8.0%	80.9%	0.7%	3086
Putumayo	5.6%	8.4%	10.1%	74.3%	1.6%	4143
Quibdó	7.5%	10.1%	11.3%	68.0%	3.0%	1323
Quindío	6.5%	8.9%	11.1%	72.5%	1.1%	2449
Riohacha	6.5%	11.5%	12.7%	67.4%	2.0%	2582
Rionegro	5.9%	7.3%	7.9%	77.9%	1.0%	1185
Risaralda	5.4%	6.4%	8.4%	78.4%	1.5%	2810
Sabaneta	8.0%	7.4%	6.7%	77.5%	0.4%	511
Sahagún	6.8%	9.2%	10.7%	71.4%	1.9%	1213
San Andrés	9.0%	11.5%	13.0%	65.2%	1.3%	555
Santa Marta	7.4%	9.6%	11.8%	69.8%	1.4%	5823
Santander	5.3%	6.4%	8.5%	79.0%	0.8%	8664
Sincelejo	8.6%	10.4%	12.4%	67.4%	1.2%	3218
Soacha	5.7%	7.2%	9.0%	77.1%	1.0%	5620
Sogamoso	4.7%	5.4%	8.9%	80.4%	0.5%	1503
Soledad	7.0%	8.0%	10.0%	73.3%	1.6%	5507
Sucre	7.7%	10.7%	13.1%	66.8%	1.8%	7731
Tolima	5.3%	7.0%	9.2%	77.0%	1.4%	9719
Tuluá	5.4%	7.0%	9.2%	77.8%	0.6%	2129
Tumaco	9.9%	15.0%	14.9%	56.9%	3.2%	2376
Tunja	5.6%	5.9%	7.3%	80.9%	0.4%	1871
Turbo	7.5%	12.6%	14.2%	63.7%	1.9%	2122
Uribia	8.9%	13.7%	14.8%	59.6%	3.0%	1095
Valle del Cauca	6.4%	7.3%	9.8%	75.8%	0.8%	8500
Valledupar	6.9%	8.1%	10.6%	73.5%	0.9%	5289
Vichada	5.8%	13.5%	11.3%	66.6%	2.8%	779
Villavicencio	5.9%	6.8%	8.6%	77.9%	0.7%	5786
Yopal	7.6%	7.0%	9.2%	75.3%	0.9%	2008
Yumbo	5.9%	7.9%	11.3%	73.8%	1.0%	1265
Zipaquirá	5.0%	5.5%	6.6%	82.0%	0.9%	1284
Colombia	6.2%	8.0%	10.0%	74.5%	1.3%	497504

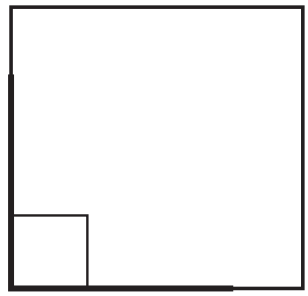
*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

- **Pregunta 25.**

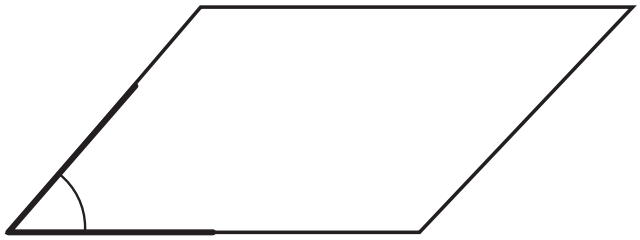
A continuación se presentan cuatro figuras geométricas, y en cada una de ellas se señala un ángulo.



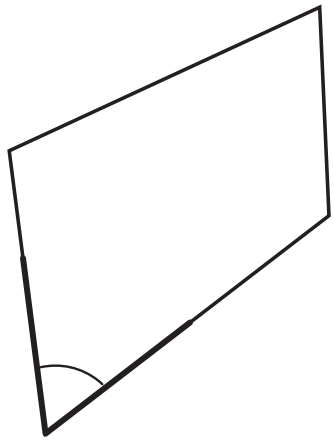
1



2



3



4

¿En cuál de las figuras se señala un ángulo obtuso?

RECUERDA:
UN ÁNGULO OBTUSO MIDE MÁS DE 90º.

A. En la 1.

B. En la 2.

C. En la 3.

D. En la 4.

• Estructura

Competencia	Razonamiento
Componente	Espacial - métrico
Afirmación	Comparar y clasificar objetos tridimensionales y figuras bidimensionales de acuerdo con sus componentes.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	36.2%	18.8%	26.3%	15.7%	3.0%	978
Antioquia	44.5%	16.0%	23.7%	14.3%	1.5%	29375
Apartadó	40.4%	15.9%	26.3%	14.3%	3.0%	1757
Arauca	49.5%	13.8%	23.7%	12.1%	0.9%	2680
Armenia	44.0%	16.8%	25.3%	12.6%	1.2%	2579
Atlántico	43.7%	17.4%	22.6%	13.8%	2.6%	5977
Barrancabermeja	49.8%	15.7%	21.0%	12.2%	1.4%	2488
Barranquilla	48.2%	16.7%	22.2%	11.9%	1.0%	12401
Bello	45.5%	18.6%	21.4%	13.4%	1.1%	3838
Bogotá, D.C.	50.4%	15.9%	21.5%	11.2%	1.0%	66881
Bolívar	38.0%	19.3%	23.9%	16.5%	2.4%	11164
Boyacá	53.3%	13.3%	21.7%	10.9%	0.8%	9267
Bucaramanga	56.2%	13.3%	20.7%	8.9%	0.9%	5302
Buenaventura	44.2%	16.4%	22.6%	14.1%	2.7%	4159
Buga	50.3%	15.3%	21.8%	11.4%	1.2%	1238
Caldas	47.9%	15.7%	22.7%	12.9%	0.8%	5750
Cali	49.0%	16.0%	21.4%	12.3%	1.3%	19640
Caquetá	44.9%	16.6%	21.9%	15.3%	1.4%	3262
Cartagena	46.7%	16.9%	21.7%	12.9%	1.8%	11456
Cartago	47.3%	15.3%	21.4%	14.6%	1.4%	1274
Casanare	48.1%	15.0%	23.3%	12.6%	1.0%	3072
Cauca	49.9%	15.1%	20.2%	13.0%	1.8%	12625
Cesar	43.8%	18.4%	22.5%	14.1%	1.3%	8484
Chocó	40.5%	19.8%	21.6%	15.8%	2.3%	3850

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Chía	53.2%	16.7%	19.3%	10.1%	0.7%	1448
Ciénaga	45.1%	17.8%	21.2%	12.9%	3.0%	1515
Cundinamarca	52.4%	14.9%	21.5%	10.5%	0.7%	16373
Córdoba	40.7%	18.4%	24.2%	15.2%	1.5%	13353
Cúcuta	49.3%	15.4%	22.9%	11.5%	0.9%	7403
Dosquebradas	49.6%	15.1%	23.8%	10.7%	0.7%	1863
Duitama	59.1%	11.0%	18.8%	10.6%	0.6%	1408
Envigado	57.0%	13.9%	20.3%	8.1%	0.7%	1415
Facatativá	54.6%	14.9%	19.8%	10.3%	0.4%	1412
Florencia	44.2%	16.6%	26.2%	12.1%	0.9%	2074
Floridablanca	54.8%	15.0%	20.0%	9.6%	0.7%	2586
Fusagasugá	50.8%	15.5%	21.9%	10.4%	1.4%	1232
Girardot	45.9%	14.2%	23.7%	13.4%	2.8%	895
Girón	47.2%	17.5%	24.4%	10.0%	0.9%	1523
Guainía	37.9%	18.2%	28.6%	12.4%	2.9%	517
Guaviare	43.9%	16.6%	24.7%	12.9%	1.9%	914
Huila	50.8%	14.2%	21.7%	12.4%	0.9%	8206
Ibagué	53.3%	14.2%	21.0%	10.7%	0.8%	5546
Ipiales	53.2%	14.1%	18.3%	13.5%	0.8%	1485
Itagüí	45.2%	16.8%	21.8%	15.2%	1.1%	2026
Jamundí	40.8%	17.9%	27.0%	13.3%	1.0%	1103
La Guajira	43.2%	17.9%	23.1%	14.0%	1.8%	3931
Lorica	44.8%	15.7%	24.9%	13.6%	1.0%	1541
Magangué	39.0%	19.4%	24.8%	14.9%	2.0%	1648
Magdalena	43.3%	17.4%	22.1%	14.7%	2.4%	9170
Maicao	40.0%	17.9%	24.0%	16.0%	2.1%	2162
Malambo	47.9%	16.2%	21.5%	12.6%	1.7%	1277
Manizales	48.7%	16.0%	22.2%	12.4%	0.7%	3144
Medellín	43.4%	17.7%	23.2%	14.2%	1.4%	20616
Meta	45.5%	15.9%	24.3%	12.9%	1.5%	6010
Montería	42.1%	18.6%	23.3%	14.6%	1.4%	5508
Mosquera	51.8%	15.9%	21.2%	10.7%	0.5%	1286
Nariño	54.1%	13.8%	18.5%	11.7%	1.9%	9300
Neiva	47.5%	15.8%	22.8%	13.0%	1.0%	3659
Norte de Santander	51.1%	14.1%	22.2%	11.8%	0.8%	8026
Palmira	55.0%	13.5%	20.9%	9.9%	0.8%	2836
Pasto	53.7%	13.8%	21.3%	10.4%	0.8%	4034
Pereira	47.9%	16.0%	23.1%	12.0%	0.9%	4350
Piedecuesta	52.6%	13.8%	20.2%	12.3%	1.1%	1482

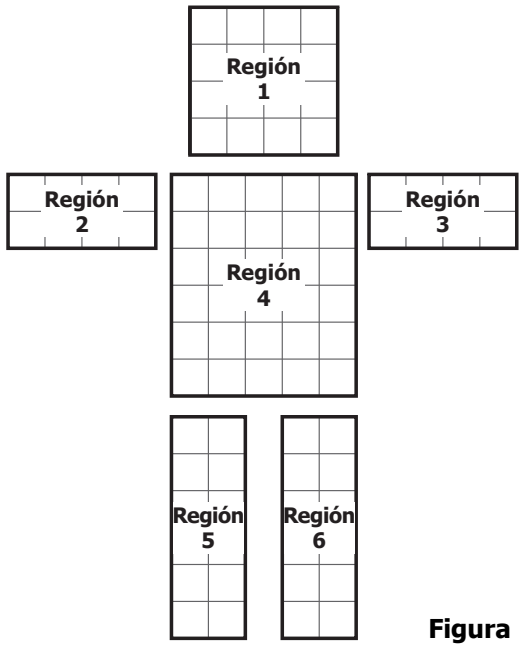
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Pitalito	48.5%	14.4%	23.8%	12.4%	0.8%	1584
Popayán	53.3%	13.9%	21.0%	10.9%	0.9%	3086
Putumayo	47.0%	15.7%	23.4%	12.6%	1.4%	4143
Quibdó	45.7%	14.3%	24.5%	13.1%	2.4%	1323
Quindío	43.9%	16.3%	25.4%	13.4%	1.1%	2449
Riohacha	40.2%	20.1%	23.2%	14.3%	2.1%	2582
Rionegro	52.4%	15.0%	20.6%	11.1%	0.8%	1185
Risaralda	47.6%	14.6%	22.6%	13.5%	1.7%	2810
Sabaneta	56.4%	12.7%	19.2%	11.2%	0.6%	511
Sahagún	45.3%	16.2%	22.5%	13.9%	2.0%	1213
San Andrés	43.6%	21.1%	22.2%	11.7%	1.4%	555
Santa Marta	45.9%	17.5%	22.9%	12.5%	1.3%	5823
Santander	53.6%	13.8%	21.4%	10.6%	0.7%	8664
Sincelejo	45.1%	16.5%	24.0%	13.3%	1.2%	3218
Soacha	45.8%	17.3%	22.9%	13.3%	0.7%	5620
Sogamoso	54.5%	15.3%	19.8%	10.3%	0.1%	1503
Soledad	48.1%	16.6%	21.1%	12.8%	1.3%	5507
Sucre	41.8%	17.8%	24.7%	14.2%	1.6%	7731
Tolima	49.2%	14.2%	22.6%	12.5%	1.4%	9719
Tuluá	49.6%	15.4%	22.1%	12.2%	0.7%	2129
Tumaco	36.8%	21.5%	21.8%	16.7%	3.1%	2376
Tunja	56.6%	13.0%	20.1%	9.8%	0.5%	1871
Turbo	36.7%	20.2%	24.9%	16.9%	1.3%	2122
Uribia	30.7%	17.9%	29.4%	18.3%	3.7%	1095
Valle del Cauca	47.1%	15.8%	23.5%	12.7%	0.9%	8500
Valledupar	48.2%	16.6%	21.9%	12.1%	1.1%	5289
Vichada	36.5%	18.5%	25.4%	16.3%	3.3%	779
Villavicencio	50.6%	14.9%	23.5%	10.2%	0.8%	5786
Yopal	45.6%	17.2%	24.0%	12.5%	0.7%	2008
Yumbo	46.8%	18.7%	21.0%	12.6%	0.9%	1265
Zipaquirá	55.3%	15.0%	20.2%	8.7%	0.7%	1284
Colombia	47.6%	16.1%	22.3%	12.6%	1.3%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 26.

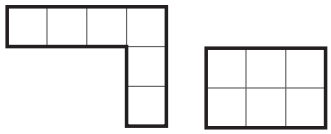
Lucía quiere armar la figura usando fichas. La figura se divide en 6 regiones.



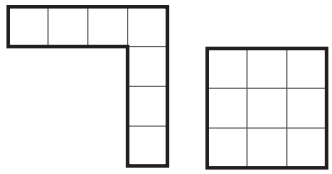
Figura

¿Con cuál de los siguientes pares de fichas Lucía puede armar la región 1?

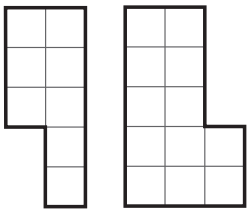
A.



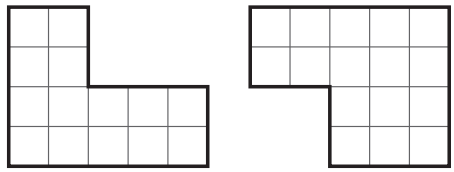
B.



C.



D.



• Estructura

Competencia	Resolución
Componente	Espacial - métrico
Afirmación	Usar representaciones geométricas y establecer relaciones entre ellas para solucionar problemas.
Nivel de desempeño	Mínimo
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	12.7%	47.9%	12.3%	24.4%	2.8%	978
Antioquia	14.1%	57.2%	9.5%	17.8%	1.4%	29375
Apartadó	14.8%	54.9%	9.3%	18.8%	2.3%	1757
Arauca	12.1%	61.5%	8.7%	16.7%	1.0%	2680
Armenia	13.5%	61.4%	8.8%	15.2%	1.1%	2579
Atlántico	14.2%	52.6%	10.5%	20.4%	2.3%	5977
Barrancabermeja	12.3%	59.7%	10.3%	16.3%	1.4%	2488
Barranquilla	14.0%	58.8%	8.9%	17.4%	0.9%	12401
Bello	14.1%	61.8%	8.2%	15.1%	0.9%	3838
Bogotá, D.C.	11.1%	68.5%	7.4%	12.1%	0.9%	66881
Bolívar	15.1%	47.5%	13.0%	22.3%	2.1%	11164
Boyacá	11.6%	65.7%	8.0%	14.1%	0.6%	9267
Bucaramanga	11.5%	70.0%	7.3%	10.2%	0.9%	5302
Buenaventura	15.4%	50.7%	9.6%	22.0%	2.3%	4159
Buga	10.9%	63.1%	7.7%	17.3%	1.1%	1238
Caldas	12.3%	61.4%	8.6%	16.9%	0.7%	5750
Cali	13.0%	62.3%	8.8%	14.9%	1.1%	19640
Caquetá	12.8%	55.1%	11.8%	18.9%	1.4%	3262
Cartagena	14.7%	54.6%	10.3%	18.9%	1.5%	11456
Cartago	13.4%	62.5%	8.8%	14.1%	1.2%	1274
Casanare	11.1%	62.9%	8.6%	16.4%	1.0%	3072
Cauca	12.4%	57.3%	9.5%	19.1%	1.7%	12625
Cesar	14.1%	56.2%	10.2%	18.3%	1.2%	8484
Chocó	15.4%	46.6%	12.6%	23.3%	2.1%	3850
Chía	11.0%	70.2%	6.5%	11.7%	0.6%	1448

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Ciénaga	14.9%	49.6%	11.3%	21.5%	2.8%	1515
Cundinamarca	10.6%	67.9%	7.3%	13.5%	0.7%	16373
Córdoba	14.7%	47.9%	12.0%	24.2%	1.2%	13353
Cúcuta	12.1%	63.8%	8.8%	14.4%	0.9%	7403
Dosquebradas	12.8%	65.6%	6.3%	14.5%	0.7%	1863
Duitama	9.1%	72.9%	6.7%	11.0%	0.4%	1408
Envigado	11.5%	66.8%	7.9%	13.4%	0.4%	1415
Facatativá	12.2%	69.2%	7.2%	11.1%	0.4%	1412
Florencia	13.0%	57.4%	10.8%	17.9%	0.9%	2074
Floridablanca	11.6%	67.9%	7.3%	12.7%	0.5%	2586
Fusagasugá	12.7%	66.2%	7.9%	12.2%	1.1%	1232
Girardot	14.7%	58.8%	8.2%	15.9%	2.5%	895
Girón	14.2%	62.7%	7.7%	14.6%	0.7%	1523
Guainía	12.2%	49.7%	11.2%	23.8%	3.1%	517
Guaviare	13.8%	57.4%	9.8%	17.4%	1.5%	914
Huila	11.7%	62.6%	8.4%	16.5%	0.7%	8206
Ibagué	11.8%	66.5%	7.6%	13.4%	0.6%	5546
Ipiales	11.8%	65.7%	8.0%	14.1%	0.4%	1485
Itagüí	14.3%	57.0%	9.9%	17.6%	1.2%	2026
Jamundí	12.7%	54.6%	10.5%	21.0%	1.2%	1103
La Guajira	15.6%	48.6%	11.6%	22.5%	1.8%	3931
Lorica	14.7%	53.7%	7.9%	22.1%	1.6%	1541
Magangué	15.6%	49.0%	12.0%	21.8%	1.6%	1648
Magdalena	14.3%	49.1%	11.7%	22.6%	2.3%	9170
Maicao	17.1%	49.0%	11.4%	21.0%	1.5%	2162
Malambo	13.0%	57.9%	9.3%	17.9%	2.0%	1277
Manizales	12.1%	66.1%	8.4%	12.8%	0.7%	3144
Medellín	14.0%	56.8%	10.4%	17.6%	1.3%	20616
Meta	12.8%	58.0%	10.3%	17.6%	1.3%	6010
Montería	15.1%	52.6%	10.2%	21.0%	1.1%	5508
Mosquera	11.0%	67.4%	8.9%	12.3%	0.5%	1286
Nariño	11.1%	64.1%	7.9%	15.3%	1.5%	9300
Neiva	12.2%	61.7%	8.6%	16.8%	0.6%	3659
Norte de Santander	12.5%	63.1%	8.9%	14.7%	0.8%	8026
Palmira	11.7%	66.3%	7.1%	14.1%	0.7%	2836
Pasto	10.8%	69.5%	6.9%	12.3%	0.6%	4034
Pereira	12.5%	63.2%	8.6%	15.0%	0.7%	4350
Piedecuesta	12.3%	66.4%	8.5%	11.9%	0.9%	1482
Pitalito	13.0%	61.9%	7.6%	16.7%	0.7%	1584

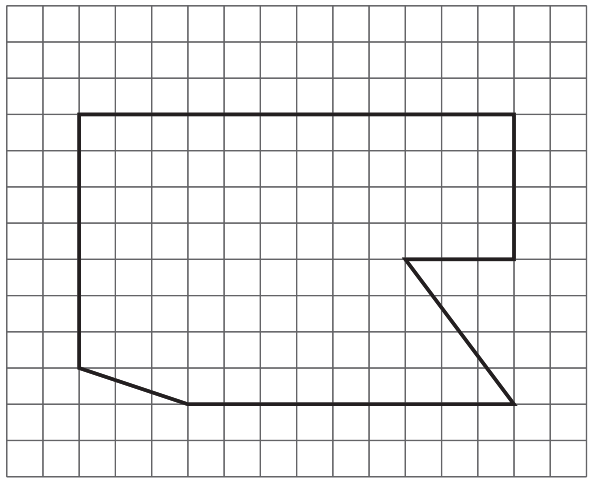
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Popayán	11.3%	67.0%	7.7%	13.2%	0.7%	3086
Putumayo	12.1%	59.4%	10.2%	16.5%	1.7%	4143
Quibdó	15.0%	49.7%	10.1%	22.8%	2.4%	1323
Quindío	13.8%	60.9%	8.7%	15.7%	1.0%	2449
Riohacha	14.9%	48.2%	12.2%	23.0%	1.7%	2582
Rionegro	12.8%	64.2%	8.1%	13.8%	1.0%	1185
Risaralda	13.6%	61.0%	8.6%	15.7%	1.2%	2810
Sabaneta	11.5%	65.8%	8.6%	13.9%	0.2%	511
Sahagún	12.9%	54.1%	10.0%	21.4%	1.7%	1213
San Andrés	18.4%	49.7%	12.4%	18.7%	0.7%	555
Santa Marta	14.9%	55.2%	10.0%	18.6%	1.3%	5823
Santander	11.9%	65.2%	7.9%	14.4%	0.6%	8664
Sincelejo	15.2%	55.7%	9.6%	18.4%	1.1%	3218
Soacha	13.2%	63.5%	7.9%	14.8%	0.7%	5620
Sogamoso	12.2%	69.3%	6.1%	12.0%	0.3%	1503
Soledad	14.3%	58.4%	9.8%	16.1%	1.4%	5507
Sucre	14.9%	49.0%	11.6%	23.3%	1.2%	7731
Tolima	12.5%	60.3%	8.8%	17.2%	1.2%	9719
Tuluá	12.4%	63.7%	8.9%	14.2%	0.8%	2129
Tumaco	15.3%	42.2%	13.8%	26.2%	2.6%	2376
Tunja	9.6%	73.4%	6.6%	10.2%	0.2%	1871
Turbo	14.9%	47.5%	11.6%	24.6%	1.4%	2122
Uribia	18.4%	39.7%	14.1%	24.8%	2.9%	1095
Valle del Cauca	12.1%	60.9%	9.3%	17.1%	0.6%	8500
Valledupar	13.4%	60.3%	8.0%	17.3%	1.1%	5289
Vichada	13.0%	47.6%	10.0%	26.8%	2.6%	779
Villavicencio	12.9%	62.8%	8.6%	14.8%	0.8%	5786
Yopal	13.2%	61.8%	9.0%	15.0%	0.9%	2008
Yumbo	13.5%	59.0%	9.6%	17.5%	0.4%	1265
Zipaquirá	10.5%	71.5%	6.5%	10.8%	0.6%	1284
Colombia	12.9%	60.2%	9.1%	16.6%	1.2%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 27.

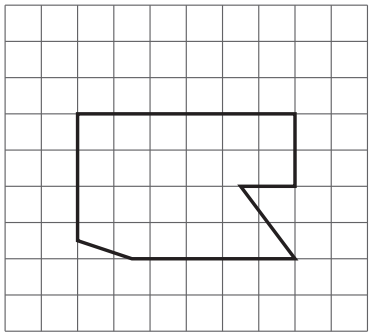
Observa la ampliación de una figura.



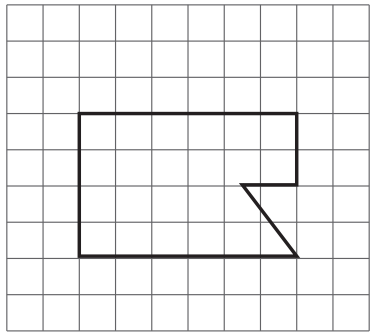
Imagen

¿Cuál figura se amplió?

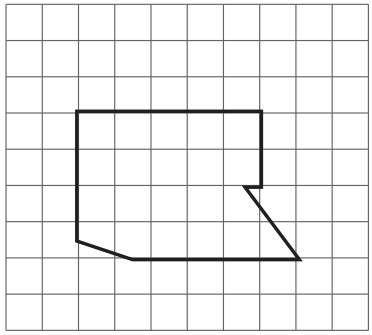
A.



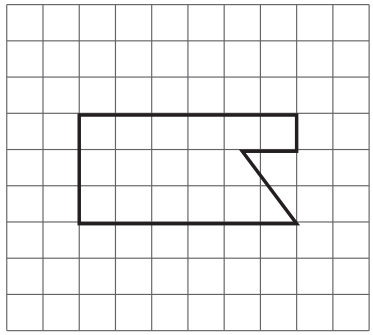
B.



C.



D.



• Estructura

Competencia	Razonamiento
Componente	Espacial - métrico
Afirmación	Conjeturar y verificar los resultados de aplicar transformaciones a figuras en el plano.
Nivel de desempeño	Mínimo
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	64.4%	14.8%	12.2%	6.5%	2.0%	978
Antioquia	72.0%	13.0%	9.4%	4.5%	1.1%	29375
Apartadó	70.7%	13.4%	8.4%	5.5%	2.0%	1757
Arauca	78.5%	9.7%	6.8%	4.4%	0.7%	2680
Armenia	75.6%	11.2%	8.5%	4.1%	0.5%	2579
Atlántico	72.2%	12.5%	8.8%	4.6%	1.8%	5977
Barrancabermeja	73.6%	12.0%	9.5%	4.0%	0.9%	2488
Barranquilla	76.3%	10.5%	8.4%	3.9%	0.9%	12401
Bello	73.8%	12.6%	8.8%	4.3%	0.5%	3838
Bogotá, D.C.	78.0%	9.9%	7.9%	3.5%	0.7%	66881
Bolívar	69.0%	14.0%	9.5%	5.6%	1.9%	11164
Boyacá	77.5%	10.2%	8.4%	3.3%	0.5%	9267
Bucaramanga	80.7%	8.5%	6.9%	3.3%	0.6%	5302
Buenaventura	73.5%	11.8%	7.9%	5.0%	1.8%	4159
Buga	74.0%	11.8%	9.3%	4.3%	0.6%	1238
Caldas	74.8%	11.9%	8.6%	4.2%	0.5%	5750
Cali	75.2%	11.7%	8.7%	3.6%	0.8%	19640
Caquetá	71.7%	13.5%	9.3%	4.4%	1.0%	3262
Cartagena	76.0%	11.1%	7.6%	4.1%	1.2%	11456
Cartago	76.8%	11.3%	7.6%	3.8%	0.5%	1274
Casanare	77.3%	10.7%	7.4%	3.9%	0.7%	3072
Cauca	73.3%	12.2%	8.5%	4.4%	1.5%	12625
Cesar	72.3%	11.8%	10.0%	5.1%	0.8%	8484
Chocó	70.4%	13.4%	9.7%	4.6%	2.0%	3850
Chía	77.3%	11.5%	7.8%	3.0%	0.3%	1448
Ciénaga	72.8%	12.5%	9.0%	4.1%	1.6%	1515

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Cundinamarca	79.1%	9.4%	7.7%	3.3%	0.5%	16373
Córdoba	70.1%	14.1%	9.9%	4.9%	1.0%	13353
Cúcuta	78.2%	9.2%	8.1%	3.9%	0.6%	7403
Dosquebradas	78.9%	10.1%	6.9%	3.7%	0.5%	1863
Duitama	82.2%	8.6%	6.4%	2.5%	0.3%	1408
Envigado	75.3%	13.1%	8.4%	3.0%	0.1%	1415
Facatativá	80.7%	8.9%	7.7%	2.5%	0.2%	1412
Florencia	74.6%	10.8%	9.2%	4.7%	0.7%	2074
Floridablanca	79.0%	9.2%	8.0%	3.2%	0.5%	2586
Fusagasugá	79.4%	9.4%	7.8%	2.7%	0.7%	1232
Girardot	76.4%	10.8%	7.7%	2.7%	2.3%	895
Girón	77.1%	10.8%	7.6%	3.9%	0.6%	1523
Guainía	68.3%	15.9%	9.5%	4.4%	1.9%	517
Guaviare	71.3%	14.1%	8.5%	4.8%	1.2%	914
Huila	77.7%	10.4%	8.1%	3.3%	0.5%	8206
Ibagué	80.5%	9.0%	7.3%	2.8%	0.4%	5546
Ipiales	80.7%	8.4%	7.5%	3.2%	0.2%	1485
Itagüí	72.0%	14.9%	8.0%	4.1%	0.9%	2026
Jamundí	74.5%	12.5%	7.7%	4.4%	0.9%	1103
La Guajira	73.1%	12.0%	8.4%	5.3%	1.2%	3931
Lorica	72.7%	12.8%	9.3%	3.5%	1.7%	1541
Magangué	69.2%	12.9%	10.9%	6.0%	1.0%	1648
Magdalena	71.4%	12.7%	8.8%	5.3%	1.9%	9170
Maicao	68.2%	14.0%	9.9%	6.4%	1.5%	2162
Malambo	79.4%	9.2%	6.5%	3.7%	1.3%	1277
Manizales	78.2%	10.7%	7.5%	3.1%	0.5%	3144
Medellín	70.9%	13.9%	9.3%	5.0%	0.9%	20616
Meta	73.7%	12.2%	8.9%	4.4%	0.9%	6010
Montería	73.3%	11.8%	9.4%	4.7%	0.8%	5508
Mosquera	80.8%	8.5%	6.9%	3.2%	0.6%	1286
Nariño	79.5%	8.7%	7.1%	3.4%	1.4%	9300
Neiva	75.8%	11.5%	8.5%	3.7%	0.4%	3659
Norte de Santander	77.5%	10.0%	8.1%	3.8%	0.6%	8026
Palmira	78.9%	10.2%	7.7%	2.9%	0.4%	2836
Pasto	82.2%	7.7%	7.1%	2.7%	0.4%	4034
Pereira	76.8%	10.8%	8.6%	3.3%	0.6%	4350
Piedecuesta	77.3%	11.1%	7.3%	3.4%	0.9%	1482
Pitalito	77.3%	11.0%	8.1%	3.0%	0.5%	1584
Popayán	75.0%	12.3%	8.3%	4.0%	0.4%	3086

Continúa en la siguiente página

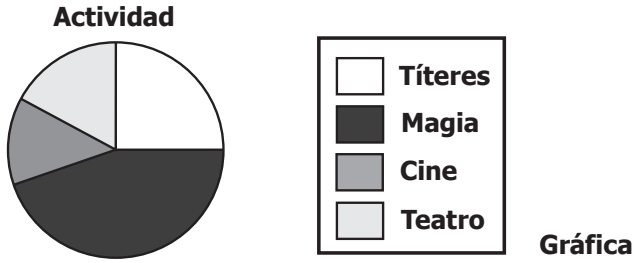
ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Putumayo	74.6%	12.0%	8.1%	4.1%	1.1%	4143
Quibdó	72.5%	12.9%	7.5%	5.0%	2.1%	1323
Quindío	78.2%	9.2%	7.9%	3.9%	0.7%	2449
Riohacha	68.0%	15.1%	10.3%	5.3%	1.2%	2582
Rionegro	76.8%	10.3%	8.7%	3.5%	0.7%	1185
Risaralda	75.5%	11.5%	7.9%	3.9%	1.2%	2810
Sabaneta	72.2%	13.1%	10.0%	4.5%	0.2%	511
Sahagún	72.9%	11.5%	9.8%	4.2%	1.6%	1213
San Andrés	75.1%	11.9%	7.7%	4.3%	0.9%	555
Santa Marta	73.0%	12.6%	8.5%	5.0%	0.9%	5823
Santander	79.7%	9.5%	7.4%	3.0%	0.4%	8664
Sincelejo	76.5%	10.7%	7.7%	4.1%	1.0%	3218
Soacha	76.2%	10.4%	9.0%	3.8%	0.5%	5620
Sogamoso	79.8%	9.9%	7.2%	2.9%	0.1%	1503
Soledad	76.3%	10.6%	8.2%	3.8%	1.1%	5507
Sucre	71.2%	13.1%	9.6%	5.2%	0.9%	7731
Tolima	75.9%	11.0%	8.8%	3.5%	0.9%	9719
Tuluá	76.9%	11.4%	8.0%	3.4%	0.3%	2129
Tumaco	64.3%	14.5%	11.4%	6.9%	2.9%	2376
Tunja	82.5%	7.7%	6.7%	2.9%	0.2%	1871
Turbo	70.2%	13.3%	10.2%	5.0%	1.3%	2122
Uribia	60.2%	18.4%	10.0%	8.8%	2.6%	1095
Valle del Cauca	77.0%	10.6%	8.3%	3.8%	0.4%	8500
Valledupar	76.3%	11.4%	7.8%	3.9%	0.6%	5289
Vichada	66.1%	14.9%	10.8%	5.9%	2.3%	779
Villavicencio	75.6%	11.9%	8.3%	3.8%	0.4%	5786
Yopal	76.6%	10.2%	8.6%	4.2%	0.3%	2008
Yumbo	76.8%	10.0%	8.6%	4.5%	0.2%	1265
Zipaquirá	84.0%	5.8%	6.7%	2.8%	0.7%	1284
Colombia	75.3%	11.3%	8.5%	4.1%	0.9%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 28.

Los estudiantes de un curso eligieron la actividad a la que quieren asistir entre títeres, magia, cine y teatro. Todos asistirán a la actividad que tuvo mayor votación.

La gráfica presenta los resultados de la votación.



¿A cuál de las actividades asistirán todos los estudiantes?

A. Títeres.
B. Magia.
C. Cine.
D. Teatro.

• Estructura

Competencia	Resolución
Componente	Aleatorio
Afirmación	Resolver problemas que requieren encontrar y/o dar significado a la medida de tendencia central de un conjunto de datos.
Nivel de desempeño	Mínimo
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	6.9%	74.6%	9.8%	6.2%	2.5%	978
Antioquia	4.9%	82.3%	6.9%	4.7%	1.2%	29375
Apartadó	5.4%	78.6%	9.3%	4.5%	2.2%	1757
Arauca	3.8%	86.1%	5.6%	3.7%	0.8%	2680
Armenia	3.9%	85.0%	7.2%	2.8%	1.1%	2579
Atlántico	5.8%	75.2%	9.9%	6.8%	2.3%	5977
Barrancabermeja	4.5%	84.2%	6.3%	4.0%	1.0%	2488
Barranquilla	4.4%	84.3%	6.5%	4.0%	0.9%	12401
Bello	3.3%	87.6%	5.5%	2.7%	0.8%	3838
Bogotá, D.C.	3.1%	89.7%	4.3%	2.1%	0.7%	66881
Bolívar	7.7%	70.0%	11.6%	8.4%	2.2%	11164
Boyacá	3.8%	87.8%	4.8%	2.9%	0.6%	9267
Bucaramanga	3.2%	89.5%	4.4%	2.3%	0.5%	5302
Buenaventura	6.1%	76.3%	8.6%	6.5%	2.5%	4159
Buga	3.9%	87.3%	5.2%	2.9%	0.7%	1238
Caldas	4.5%	85.6%	5.9%	3.5%	0.5%	5750
Cali	3.9%	86.5%	5.7%	3.0%	0.9%	19640
Caquetá	6.2%	78.2%	7.8%	6.5%	1.3%	3262
Cartagena	5.9%	79.5%	8.2%	5.1%	1.2%	11456
Cartago	4.1%	85.9%	6.4%	2.6%	0.9%	1274
Casanare	4.3%	86.0%	5.6%	3.4%	0.7%	3072
Cauca	6.0%	78.9%	7.5%	5.8%	1.7%	12625
Cesar	5.4%	78.2%	9.1%	6.2%	1.1%	8484
Chocó	7.6%	68.8%	11.4%	10.1%	2.0%	3850
Chía	2.8%	91.3%	3.7%	1.7%	0.4%	1448
Ciénaga	6.5%	73.4%	11.2%	6.9%	2.0%	1515
Cundinamarca	2.9%	90.1%	4.0%	2.4%	0.5%	16373
Córdoba	7.1%	74.0%	10.3%	7.4%	1.3%	13353
Cúcuta	3.9%	87.0%	5.4%	3.0%	0.7%	7403
Dosquebradas	3.4%	89.2%	4.8%	1.8%	0.7%	1863
Duitama	2.5%	92.3%	3.2%	1.8%	0.3%	1408
Envigado	3.4%	88.3%	4.8%	3.0%	0.5%	1415
Facatativá	3.3%	91.3%	3.2%	2.1%	0.2%	1412
Florencia	5.8%	81.4%	7.9%	4.3%	0.7%	2074
Floridablanca	2.8%	88.7%	5.7%	2.3%	0.5%	2586
Fusagasugá	2.8%	89.0%	4.6%	2.8%	0.8%	1232
Girardot	4.6%	81.7%	6.7%	4.5%	2.6%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	3.9%	87.5%	5.5%	2.4%	0.7%	1523
Guainía	5.2%	79.1%	8.3%	5.6%	1.7%	517
Guaviare	3.4%	81.7%	7.8%	6.0%	1.1%	914
Huila	4.4%	86.4%	5.2%	3.4%	0.5%	8206
Ibagué	3.3%	88.7%	4.8%	2.7%	0.6%	5546
Ipiales	3.1%	89.1%	4.2%	3.2%	0.4%	1485
Itagüí	3.8%	82.6%	9.1%	3.6%	0.9%	2026
Jamundí	5.1%	82.8%	7.7%	3.9%	0.5%	1103
La Guajira	6.2%	74.6%	9.5%	8.3%	1.4%	3931
Lorica	5.8%	78.4%	8.5%	5.3%	2.1%	1541
Magangué	7.3%	74.5%	10.6%	6.4%	1.2%	1648
Magdalena	7.3%	72.7%	10.2%	8.1%	1.8%	9170
Maicao	6.7%	75.3%	9.0%	7.2%	1.9%	2162
Malambo	6.1%	80.0%	7.6%	4.8%	1.5%	1277
Manizales	2.8%	90.0%	4.5%	2.4%	0.4%	3144
Medellín	5.2%	82.2%	7.8%	3.7%	1.1%	20616
Meta	5.1%	83.8%	6.8%	3.3%	1.0%	6010
Montería	6.0%	79.6%	7.9%	5.4%	1.1%	5508
Mosquera	2.3%	92.9%	2.7%	1.6%	0.5%	1286
Nariño	4.5%	84.7%	5.2%	4.0%	1.5%	9300
Neiva	3.7%	86.5%	5.6%	3.7%	0.5%	3659
Norte de Santander	4.3%	85.5%	5.8%	3.7%	0.7%	8026
Palmira	3.5%	88.5%	4.9%	2.8%	0.3%	2836
Pasto	2.9%	90.9%	3.8%	1.9%	0.5%	4034
Pereira	3.8%	88.9%	4.4%	2.5%	0.5%	4350
Piedecuesta	4.1%	87.6%	5.1%	2.6%	0.5%	1482
Pitalito	4.5%	87.1%	5.3%	2.8%	0.3%	1584
Popayán	3.5%	88.9%	4.4%	2.7%	0.5%	3086
Putumayo	5.0%	82.4%	6.2%	4.8%	1.6%	4143
Quibdó	6.1%	75.0%	10.1%	6.3%	2.4%	1323
Quindío	4.8%	84.5%	6.2%	3.8%	0.7%	2449
Riohacha	6.2%	75.1%	9.6%	7.5%	1.6%	2582
Rionegro	3.3%	89.3%	4.2%	2.4%	0.8%	1185
Risaralda	4.5%	86.6%	4.9%	2.8%	1.2%	2810
Sabaneta	3.5%	87.7%	5.5%	2.9%	0.4%	511
Sahagún	5.2%	83.0%	6.8%	3.7%	1.3%	1213
San Andrés	6.5%	82.2%	7.6%	3.4%	0.4%	555
Santa Marta	5.7%	79.3%	8.6%	5.3%	1.1%	5823
Santander	3.5%	87.9%	5.2%	2.9%	0.5%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	5.2%	81.4%	8.2%	4.2%	1.0%	3218
Soacha	3.8%	88.3%	4.8%	2.5%	0.5%	5620
Sogamoso	3.0%	91.3%	3.9%	1.7%	0.1%	1503
Soledad	4.3%	85.1%	5.6%	3.8%	1.2%	5507
Sucre	6.6%	75.4%	9.7%	7.1%	1.3%	7731
Tolima	4.5%	84.4%	5.8%	4.3%	0.9%	9719
Tuluá	3.1%	88.4%	5.4%	2.8%	0.5%	2129
Tumaco	9.0%	64.4%	12.5%	11.2%	3.0%	2376
Tunja	3.0%	91.0%	3.5%	2.2%	0.2%	1871
Turbo	7.7%	71.2%	12.0%	7.8%	1.4%	2122
Uribia	10.7%	60.0%	12.2%	14.2%	2.8%	1095
Valle del Cauca	4.0%	86.5%	5.8%	3.3%	0.5%	8500
Valledupar	3.9%	83.9%	7.1%	4.3%	0.8%	5289
Vichada	7.1%	73.4%	8.2%	8.2%	3.1%	779
Villavicencio	4.0%	86.5%	5.6%	3.3%	0.6%	5786
Yopal	4.2%	86.5%	6.3%	2.4%	0.5%	2008
Yumbo	4.9%	85.2%	6.6%	3.2%	0.2%	1265
Zipaquirá	2.4%	91.9%	3.6%	1.6%	0.5%	1284
Colombia	4.6%	83.8%	6.5%	4.1%	1.0%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 29.

Javier decide darle a cada uno de sus sobrinos $2.500. En total les dio $17.500.

¿Cuántos sobrinos tiene Javier?

A. 6
B. 7
C. 15
D. 20

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver y formular problemas multiplicativos rutinarios y no rutinarios de adición repetida, factor multiplicante, razón y producto cartesiano.
Nivel de desempeño	Mínimo
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	18.3%	42.1%	22.0%	14.7%	2.9%	978
Antioquia	17.8%	55.2%	16.1%	9.2%	1.6%	29375
Apartadó	19.5%	52.2%	17.1%	9.0%	2.2%	1757
Arauca	16.4%	59.6%	15.2%	7.8%	1.1%	2680
Armenia	17.1%	55.7%	16.0%	10.0%	1.2%	2579
Atlántico	18.0%	49.5%	18.3%	11.3%	2.8%	5977
Barrancabermeja	18.5%	56.6%	15.1%	8.5%	1.3%	2488
Barranquilla	19.0%	55.8%	15.9%	8.1%	1.3%	12401
Bello	18.1%	58.7%	15.4%	6.6%	1.1%	3838
Bogotá, D.C.	15.0%	63.0%	15.0%	6.0%	1.0%	66881
Bolívar	19.8%	43.5%	20.5%	13.9%	2.4%	11164
Boyacá	14.0%	63.7%	14.3%	7.3%	0.6%	9267
Bucaramanga	13.5%	68.4%	12.0%	5.1%	0.9%	5302
Buenaventura	18.3%	53.2%	16.3%	9.3%	2.9%	4159
Buga	15.7%	59.0%	17.3%	6.9%	1.2%	1238
Caldas	16.1%	57.5%	16.7%	8.9%	0.9%	5750
Cali	17.0%	58.8%	15.7%	7.1%	1.4%	19640
Caquetá	17.0%	55.5%	16.9%	9.5%	1.2%	3262
Cartagena	18.6%	53.5%	16.2%	9.9%	1.8%	11456
Cartago	15.5%	59.3%	16.7%	7.5%	0.9%	1274
Casanare	15.2%	59.2%	16.5%	8.0%	1.1%	3072
Cauca	14.8%	57.5%	15.0%	10.7%	1.9%	12625
Cesar	17.3%	53.8%	16.0%	11.6%	1.2%	8484
Chocó	17.5%	46.3%	18.1%	15.7%	2.4%	3850
Chía	15.6%	64.1%	14.7%	4.9%	0.7%	1448
Ciénaga	17.6%	51.6%	17.7%	10.8%	2.3%	1515
Cundinamarca	13.7%	65.4%	13.7%	6.5%	0.7%	16373
Córdoba	18.7%	45.3%	20.3%	14.1%	1.5%	13353
Cúcuta	16.0%	60.9%	14.3%	7.6%	1.2%	7403
Dosquebradas	15.9%	61.7%	14.6%	6.8%	1.0%	1863
Duitama	11.0%	69.9%	13.0%	5.6%	0.5%	1408
Envigado	15.2%	62.2%	16.1%	5.8%	0.7%	1415
Facatativá	15.4%	65.4%	13.3%	5.5%	0.4%	1412
Florencia	16.7%	58.4%	14.9%	8.7%	1.4%	2074
Floridablanca	15.0%	63.7%	14.8%	5.8%	0.7%	2586
Fusagasugá	14.8%	63.3%	14.5%	5.9%	1.5%	1232
Girardot	17.1%	55.2%	15.1%	10.3%	2.3%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	17.0%	61.0%	14.4%	6.6%	1.0%	1523
Guainía	16.4%	48.2%	18.4%	14.7%	2.3%	517
Guaviare	20.2%	54.3%	15.6%	8.0%	1.9%	914
Huila	14.7%	59.5%	16.0%	9.0%	0.8%	8206
Ibagué	15.1%	63.5%	13.8%	6.9%	0.7%	5546
Ipiales	14.3%	64.0%	13.6%	7.5%	0.6%	1485
Itagüí	20.2%	53.6%	17.3%	7.3%	1.7%	2026
Jamundí	17.9%	52.0%	18.5%	10.6%	1.0%	1103
La Guajira	16.8%	48.2%	18.3%	14.8%	2.0%	3931
Lorica	16.7%	48.9%	17.5%	14.9%	1.9%	1541
Magangué	20.4%	44.2%	19.9%	14.2%	1.3%	1648
Magdalena	17.9%	48.1%	17.6%	13.8%	2.6%	9170
Maicao	21.4%	44.9%	19.3%	12.2%	2.3%	2162
Malambo	14.6%	57.5%	14.3%	11.6%	2.0%	1277
Manizales	15.9%	61.4%	15.4%	6.7%	0.7%	3144
Medellín	18.9%	54.6%	16.8%	8.3%	1.3%	20616
Meta	17.0%	56.9%	16.2%	8.4%	1.4%	6010
Montería	20.6%	49.4%	18.0%	10.5%	1.5%	5508
Mosquera	15.6%	61.1%	15.1%	7.4%	0.8%	1286
Nariño	14.9%	61.9%	12.7%	8.8%	1.7%	9300
Neiva	15.5%	59.6%	15.6%	8.4%	1.0%	3659
Norte de Santander	14.4%	61.2%	14.8%	8.6%	1.0%	8026
Palmira	14.6%	60.1%	16.9%	7.6%	0.8%	2836
Pasto	14.3%	64.7%	14.4%	5.9%	0.7%	4034
Pereira	15.9%	61.4%	14.9%	7.2%	0.7%	4350
Piedecuesta	14.6%	63.0%	14.8%	6.6%	1.0%	1482
Pitalito	17.0%	59.0%	15.7%	7.6%	0.6%	1584
Popayán	13.8%	62.7%	14.6%	7.9%	1.0%	3086
Putumayo	16.4%	57.2%	15.1%	9.8%	1.5%	4143
Quibdó	17.4%	48.9%	18.2%	12.2%	3.3%	1323
Quindío	17.7%	56.9%	15.6%	8.7%	1.1%	2449
Riohacha	18.7%	49.5%	18.7%	11.3%	1.8%	2582
Rionegro	18.2%	58.6%	14.9%	7.2%	1.1%	1185
Risaralda	16.4%	58.0%	14.8%	8.9%	1.9%	2810
Sabaneta	16.4%	62.2%	14.9%	6.3%	0.2%	511
Sahagún	18.1%	50.1%	19.0%	11.0%	1.6%	1213
San Andrés	20.7%	49.9%	19.3%	9.0%	1.1%	555
Santa Marta	17.1%	55.9%	17.4%	8.2%	1.4%	5823
Santander	14.2%	63.8%	13.7%	7.5%	0.9%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	19.4%	51.1%	18.2%	9.8%	1.5%	3218
Soacha	16.3%	60.8%	15.1%	7.2%	0.7%	5620
Sogamoso	14.6%	67.7%	12.0%	5.1%	0.5%	1503
Soledad	17.8%	58.0%	15.2%	7.7%	1.3%	5507
Sucre	18.7%	45.5%	19.5%	14.6%	1.6%	7731
Tolima	15.1%	58.1%	14.8%	10.8%	1.3%	9719
Tuluá	15.5%	61.5%	14.9%	7.2%	0.9%	2129
Tumaco	18.7%	41.2%	19.8%	16.7%	3.6%	2376
Tunja	13.7%	66.4%	13.4%	6.1%	0.3%	1871
Turbo	20.7%	43.1%	19.9%	14.3%	1.9%	2122
Uribia	16.4%	43.3%	19.3%	17.1%	3.9%	1095
Valle del Cauca	16.6%	57.2%	15.9%	9.4%	1.0%	8500
Valledupar	17.4%	54.2%	17.3%	10.1%	1.1%	5289
Vichada	17.5%	48.0%	17.2%	14.0%	3.3%	779
Villavicencio	15.9%	62.5%	14.4%	6.2%	1.0%	5786
Yopal	17.2%	60.5%	14.1%	7.3%	0.9%	2008
Yumbo	18.3%	56.3%	16.2%	8.1%	1.2%	1265
Zipaquirá	12.9%	66.4%	12.5%	7.4%	0.8%	1284
Colombia	16.6%	57.4%	15.9%	8.8%	1.3%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 30.

Carolina leyó en su libro de historia que hace muchos años, en Colombia, **nueve de cada diez** personas no sabían leer ni escribir.

¿Cuál es el número que representa correctamente la información sobre la cantidad de personas que no sabían leer ni escribir?

A. $\frac{9}{10}$

B. $\frac{10}{9}$

C. 109

D. 910

• Estructura

Competencia	Comunicación
Componente	Numérico - variacional
Afirmación	Reconocer diferentes representaciones de un mismo número (natural o fracción) y hacer traducciones entre ellas.
Nivel de desempeño	Mínimo
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	46.5%	16.4%	19.4%	14.4%	3.3%	978
Antioquia	61.3%	14.2%	11.6%	11.3%	1.6%	29375
Apartadó	59.6%	13.8%	12.6%	11.4%	2.5%	1757
Arauca	63.9%	13.1%	12.1%	10.0%	0.9%	2680
Armenia	67.2%	13.4%	10.4%	7.8%	1.2%	2579
Atlántico	54.4%	14.8%	15.7%	12.0%	3.1%	5977
Barrancabermeja	66.6%	12.5%	10.4%	9.1%	1.5%	2488
Barranquilla	63.9%	13.8%	11.3%	9.7%	1.3%	12401
Bello	70.1%	13.5%	9.0%	6.5%	0.9%	3838
Bogotá, D.C.	73.1%	11.4%	8.1%	6.3%	1.0%	66881
Bolívar	47.6%	16.9%	16.9%	16.0%	2.6%	11164
Boyacá	68.2%	12.5%	9.9%	8.5%	0.8%	9267
Bucaramanga	75.8%	10.0%	7.7%	5.8%	0.7%	5302
Buenaventura	58.2%	13.4%	12.5%	13.0%	2.9%	4159
Buga	68.3%	12.8%	10.2%	7.4%	1.2%	1238
Caldas	65.3%	13.3%	10.6%	9.9%	0.8%	5750
Cali	68.4%	13.3%	9.4%	7.6%	1.3%	19640
Caquetá	56.9%	15.6%	13.2%	12.5%	1.8%	3262
Cartagena	60.6%	14.0%	12.8%	10.9%	1.6%	11456
Cartago	66.2%	13.7%	11.1%	7.9%	1.1%	1274
Casanare	65.0%	12.2%	11.7%	9.8%	1.3%	3072
Cauca	59.3%	14.0%	12.4%	12.2%	2.1%	12625
Cesar	54.7%	15.2%	14.8%	13.9%	1.3%	8484
Chocó	48.6%	17.2%	15.7%	16.3%	2.3%	3850
Chía	76.5%	10.6%	7.1%	5.0%	0.8%	1448
Ciénaga	52.8%	14.1%	15.7%	14.9%	2.4%	1515
Cundinamarca	72.2%	11.7%	8.3%	7.0%	0.8%	16373
Córdoba	48.2%	16.9%	17.4%	15.7%	1.8%	13353
Cúcuta	70.1%	11.4%	9.6%	7.8%	1.1%	7403
Dosquebradas	72.8%	11.6%	7.8%	7.3%	0.5%	1863
Duitama	79.3%	9.7%	6.1%	4.5%	0.3%	1408
Envigado	75.8%	11.0%	7.7%	5.0%	0.4%	1415
Facatativá	75.7%	10.1%	7.8%	6.1%	0.4%	1412
Florencia	60.8%	13.9%	13.4%	10.9%	1.0%	2074
Floridablanca	74.6%	10.5%	7.7%	6.4%	0.8%	2586
Fusagasugá	72.4%	12.4%	7.6%	6.7%	0.8%	1232
Girardot	62.5%	13.4%	11.8%	9.2%	3.1%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	66.1%	12.8%	11.3%	8.5%	1.2%	1523
Guainía	55.9%	13.3%	14.9%	13.5%	2.3%	517
Guaviare	57.0%	17.5%	12.0%	11.1%	2.4%	914
Huila	66.2%	12.4%	10.5%	10.1%	0.9%	8206
Ibagué	70.9%	11.9%	9.2%	7.3%	0.7%	5546
Ipiales	72.7%	11.4%	7.7%	7.6%	0.5%	1485
Itagüí	66.6%	12.7%	11.5%	8.0%	1.2%	2026
Jamundí	59.6%	17.0%	12.4%	9.5%	1.5%	1103
La Guajira	54.6%	14.2%	14.8%	14.3%	2.0%	3931
Lorica	53.3%	14.1%	16.2%	13.4%	2.9%	1541
Magangué	50.3%	15.1%	17.7%	15.4%	1.6%	1648
Magdalena	51.9%	15.9%	15.5%	14.1%	2.6%	9170
Maicao	53.2%	14.8%	15.2%	14.2%	2.6%	2162
Malambo	58.7%	13.7%	14.9%	11.1%	1.6%	1277
Manizales	72.8%	11.4%	8.4%	6.9%	0.5%	3144
Medellín	63.7%	14.3%	11.3%	9.1%	1.6%	20616
Meta	62.6%	13.5%	11.5%	11.1%	1.3%	6010
Montería	57.9%	14.8%	13.4%	12.5%	1.3%	5508
Mosquera	76.2%	11.4%	6.7%	5.1%	0.6%	1286
Nariño	66.4%	12.1%	9.3%	10.5%	1.7%	9300
Neiva	68.9%	12.8%	9.8%	7.6%	0.9%	3659
Norte de Santander	67.5%	12.5%	9.6%	9.5%	0.9%	8026
Palmira	72.4%	12.4%	8.3%	6.1%	0.8%	2836
Pasto	74.1%	12.1%	6.8%	6.2%	0.7%	4034
Pereira	70.1%	12.1%	9.4%	7.4%	0.9%	4350
Piedecuesta	70.2%	11.2%	10.0%	7.6%	0.9%	1482
Pitalito	64.5%	13.6%	11.0%	10.2%	0.7%	1584
Popayán	69.3%	13.2%	9.3%	7.1%	1.0%	3086
Putumayo	61.9%	13.5%	12.4%	10.5%	1.7%	4143
Quibdó	54.5%	14.1%	14.1%	14.8%	2.5%	1323
Quindío	62.1%	15.4%	11.5%	9.8%	1.2%	2449
Riohacha	55.9%	13.6%	14.4%	14.2%	1.9%	2582
Rionegro	73.2%	12.3%	7.6%	6.0%	0.8%	1185
Risaralda	66.2%	12.5%	9.8%	10.0%	1.6%	2810
Sabaneta	76.3%	10.8%	6.5%	5.7%	0.8%	511
Sahagún	58.6%	15.0%	13.0%	11.6%	1.7%	1213
San Andrés	54.8%	16.2%	14.6%	13.7%	0.7%	555
Santa Marta	61.2%	14.3%	12.5%	10.7%	1.4%	5823
Santander	69.6%	11.6%	9.5%	8.6%	0.7%	8664

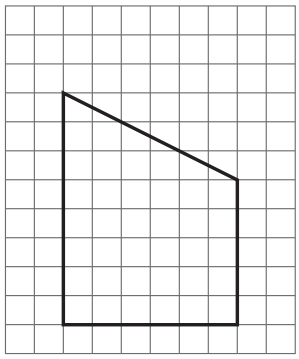
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	59.7%	14.3%	13.5%	11.2%	1.3%	3218
Soacha	69.1%	12.9%	9.5%	7.7%	0.8%	5620
Sogamoso	77.3%	10.9%	6.9%	4.7%	0.2%	1503
Soledad	65.6%	12.1%	11.7%	9.0%	1.5%	5507
Sucre	51.3%	15.6%	16.6%	14.8%	1.8%	7731
Tolima	62.2%	13.2%	12.2%	11.0%	1.4%	9719
Tuluá	70.7%	10.7%	9.7%	8.1%	0.8%	2129
Tumaco	42.9%	16.9%	18.3%	18.7%	3.2%	2376
Tunja	75.6%	10.3%	7.5%	6.3%	0.3%	1871
Turbo	47.7%	17.1%	16.6%	16.9%	1.7%	2122
Uribia	41.1%	19.0%	17.4%	19.7%	2.7%	1095
Valle del Cauca	63.2%	14.6%	11.6%	9.8%	0.8%	8500
Valledupar	64.5%	12.3%	10.8%	11.3%	1.1%	5289
Vichada	53.4%	14.2%	15.4%	13.7%	3.2%	779
Villavicencio	69.0%	12.0%	9.4%	8.6%	1.0%	5786
Yopal	67.1%	13.4%	9.3%	9.5%	0.7%	2008
Yumbo	64.6%	14.6%	10.5%	9.8%	0.5%	1265
Zipaquirá	77.3%	8.0%	7.8%	6.2%	0.8%	1284
Colombia	64.4%	13.3%	11.1%	9.8%	1.4%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 31.

Observa la figura dibujada sobre la cuadrícula.



Cada □ mide 1 cm^2.

¿Cuál es el área de la figura?

A. 19 cm^2.
B. 30 cm^2.
C. 39 cm^2.
D. 48 cm^2.

• Estructura

Competencia	Razonamiento
Componente	Numérico - variacional
Afirmación	Justificar y generar equivalencias entre expresiones numéricas.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	10.6%	13.6%	39.3%	33.5%	3.0%	978
Antioquia	10.2%	11.0%	51.8%	25.6%	1.5%	29375
Apartadó	10.2%	10.5%	51.3%	25.6%	2.3%	1757
Arauca	9.0%	11.1%	55.5%	23.4%	1.0%	2680
Armenia	10.1%	12.0%	53.3%	23.7%	1.0%	2579
Atlántico	11.6%	12.6%	45.8%	26.9%	3.0%	5977
Barrancabermeja	9.0%	10.9%	55.7%	23.0%	1.6%	2488
Barranquilla	10.8%	11.2%	52.8%	23.9%	1.2%	12401
Bello	9.9%	11.2%	58.4%	19.6%	0.9%	3838
Bogotá, D.C.	8.0%	9.4%	62.8%	18.7%	1.0%	66881
Bolívar	12.0%	13.1%	41.4%	31.2%	2.3%	11164
Boyacá	8.8%	9.9%	59.3%	21.1%	0.9%	9267
Bucaramanga	7.7%	9.5%	64.6%	17.4%	0.8%	5302
Buenaventura	10.9%	11.9%	45.6%	28.9%	2.9%	4159
Buga	10.3%	10.6%	52.5%	25.5%	1.1%	1238
Caldas	9.6%	10.4%	54.5%	24.8%	0.7%	5750
Cali	9.6%	10.8%	55.8%	22.5%	1.3%	19640
Caquetá	9.7%	11.4%	51.8%	25.6%	1.4%	3262
Cartagena	10.1%	12.3%	50.0%	26.1%	1.6%	11456
Cartago	9.4%	10.4%	55.8%	23.3%	1.0%	1274
Casanare	9.3%	9.0%	56.9%	23.5%	1.2%	3072
Cauca	8.6%	10.8%	50.1%	28.5%	2.0%	12625
Cesar	10.0%	12.0%	48.1%	28.7%	1.2%	8484
Chocó	11.6%	10.2%	41.6%	34.4%	2.2%	3850
Chía	6.6%	8.4%	66.9%	17.6%	0.6%	1448
Ciénaga	10.2%	10.8%	46.1%	30.7%	2.2%	1515
Cundinamarca	7.8%	9.7%	61.6%	20.2%	0.7%	16373
Córdoba	11.8%	13.0%	43.8%	29.9%	1.6%	13353
Cúcuta	8.4%	10.6%	57.7%	22.1%	1.1%	7403
Dosquebradas	8.6%	11.8%	57.2%	21.9%	0.5%	1863
Duitama	6.7%	8.7%	68.7%	15.4%	0.4%	1408
Envigado	7.8%	9.3%	64.0%	18.2%	0.6%	1415
Facatativá	7.2%	10.6%	64.1%	17.8%	0.3%	1412
Florencia	10.9%	11.1%	52.4%	24.7%	0.8%	2074
Floridablanca	8.8%	9.5%	63.0%	18.1%	0.7%	2586
Fusagasugá	7.0%	10.3%	60.0%	21.5%	1.2%	1232
Girardot	7.9%	13.7%	51.5%	24.7%	2.1%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	7.7%	12.9%	58.1%	20.2%	1.1%	1523
Guainía	10.8%	10.6%	39.8%	36.8%	1.9%	517
Guaviare	9.6%	12.6%	51.6%	24.3%	1.9%	914
Huila	9.1%	10.3%	54.1%	25.8%	0.6%	8206
Ibagué	8.6%	9.6%	60.9%	20.1%	0.7%	5546
Ipiales	8.6%	10.3%	55.2%	25.4%	0.5%	1485
Itagüí	10.5%	13.0%	53.9%	21.2%	1.3%	2026
Jamundí	11.5%	13.1%	46.7%	27.9%	0.7%	1103
La Guajira	11.2%	11.2%	43.8%	31.7%	2.1%	3931
Lorica	10.8%	12.0%	46.3%	28.9%	2.0%	1541
Magangué	11.3%	13.5%	42.2%	31.5%	1.5%	1648
Magdalena	10.9%	11.8%	44.6%	30.6%	2.1%	9170
Maicao	11.7%	12.2%	41.7%	32.3%	2.1%	2162
Malambo	9.1%	10.2%	51.9%	27.0%	1.8%	1277
Manizales	8.3%	9.4%	61.2%	20.4%	0.8%	3144
Medellín	11.0%	12.3%	53.3%	22.1%	1.4%	20616
Meta	9.8%	10.0%	54.2%	24.6%	1.3%	6010
Montería	11.0%	11.8%	49.9%	26.2%	1.1%	5508
Mosquera	7.7%	7.3%	64.7%	19.5%	0.8%	1286
Nariño	8.6%	9.4%	54.1%	26.3%	1.6%	9300
Neiva	9.2%	11.6%	55.8%	22.6%	0.8%	3659
Norte de Santander	9.1%	10.0%	57.4%	22.6%	1.0%	8026
Palmira	9.1%	9.2%	56.7%	24.5%	0.5%	2836
Pasto	9.0%	9.3%	58.7%	22.3%	0.7%	4034
Pereira	8.5%	10.8%	58.3%	21.7%	0.6%	4350
Piedecuesta	8.7%	9.6%	60.5%	19.9%	1.2%	1482
Pitalito	9.2%	9.7%	55.4%	24.8%	0.8%	1584
Popayán	8.1%	10.6%	58.4%	22.2%	0.7%	3086
Putumayo	9.6%	11.3%	50.2%	27.2%	1.8%	4143
Quibdó	10.7%	11.4%	45.4%	30.1%	2.3%	1323
Quindío	10.5%	10.8%	53.0%	24.6%	1.0%	2449
Riohacha	11.1%	12.7%	45.4%	28.9%	2.0%	2582
Rionegro	8.0%	10.2%	61.2%	19.7%	0.8%	1185
Risaralda	9.0%	10.4%	53.7%	25.6%	1.3%	2810
Sabaneta	7.0%	9.4%	67.1%	15.5%	1.0%	511
Sahagún	9.1%	11.2%	48.9%	29.1%	1.7%	1213
San Andrés	10.8%	12.1%	47.4%	28.8%	0.9%	555
Santa Marta	10.8%	12.7%	49.5%	25.6%	1.5%	5823
Santander	9.0%	10.1%	58.8%	21.4%	0.7%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	10.6%	12.2%	50.3%	25.8%	1.1%	3218
Soacha	9.7%	10.5%	57.1%	22.0%	0.8%	5620
Sogamoso	6.9%	9.5%	65.6%	17.8%	0.3%	1503
Soledad	10.6%	10.2%	53.5%	24.2%	1.5%	5507
Sucre	10.9%	12.3%	44.7%	30.5%	1.5%	7731
Tolima	9.1%	10.0%	54.2%	25.3%	1.4%	9719
Tuluá	8.3%	11.1%	55.5%	24.4%	0.7%	2129
Tumaco	14.0%	13.5%	36.2%	33.3%	2.9%	2376
Tunja	7.3%	9.1%	64.5%	18.8%	0.3%	1871
Turbo	12.3%	13.7%	41.1%	31.2%	1.7%	2122
Uribia	11.1%	13.3%	34.2%	38.4%	2.9%	1095
Valle del Cauca	9.8%	10.3%	53.0%	26.2%	0.8%	8500
Valledupar	8.8%	11.3%	53.9%	24.9%	1.1%	5289
Vichada	10.3%	9.8%	42.5%	34.5%	3.0%	779
Villavicencio	8.3%	10.3%	59.1%	21.4%	0.9%	5786
Yopal	8.7%	10.3%	58.3%	21.9%	0.9%	2008
Yumbo	9.5%	11.5%	54.8%	23.9%	0.4%	1265
Zipaquirá	7.7%	7.8%	63.3%	20.2%	0.9%	1284
Colombia	9.5%	10.8%	54.3%	24.0%	1.3%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 32.

A un evento deportivo asistieron niños y adultos. Por cada 7 niños había 2 adultos.
Si en total había 28 niños, ¿cuántos adultos asistieron?

A. 19
B. 9
C. 8
D. 7

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver y formular problemas multiplicativos rutinarios y no rutinarios de adición repetida, factor multiplicante, razón y producto cartesiano
Nivel de desempeño	Avanzado
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	36.9%	25.3%	22.5%	13.2%	2.1%	978
Antioquia	34.3%	16.3%	37.1%	10.9%	1.3%	29375
Apartadó	32.8%	17.0%	36.3%	11.6%	2.4%	1757
Arauca	28.1%	17.3%	43.4%	10.4%	0.7%	2680
Armenia	37.7%	17.8%	35.2%	8.4%	0.9%	2579
Atlántico	33.8%	20.2%	31.1%	12.6%	2.2%	5977
Barrancabermeja	34.3%	15.2%	39.5%	9.5%	1.6%	2488
Barranquilla	35.4%	17.2%	35.8%	10.5%	1.1%	12401
Bello	36.5%	15.7%	37.5%	9.4%	0.8%	3838
Bogotá, D.C.	34.0%	13.8%	42.0%	9.3%	1.0%	66881
Bolívar	36.2%	20.5%	27.6%	13.6%	2.0%	11164
Boyacá	30.9%	14.6%	43.7%	10.2%	0.5%	9267
Bucaramanga	29.2%	13.6%	47.5%	9.0%	0.8%	5302
Buenaventura	31.4%	17.1%	36.2%	12.9%	2.3%	4159
Buga	36.4%	15.9%	36.7%	9.9%	1.1%	1238
Caldas	34.1%	17.3%	38.8%	9.0%	0.7%	5750

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Cali	35.8%	16.1%	37.2%	9.6%	1.2%	19640
Caquetá	32.5%	17.6%	37.6%	11.2%	1.1%	3262
Cartagena	35.1%	17.0%	35.2%	11.2%	1.4%	11456
Cartago	36.7%	16.6%	36.2%	9.4%	1.1%	1274
Casanare	30.4%	17.4%	40.7%	10.8%	0.7%	3072
Cauca	30.5%	16.9%	39.1%	11.7%	1.9%	12625
Cesar	32.3%	18.4%	36.1%	12.2%	1.0%	8484
Chocó	30.8%	21.4%	31.5%	14.2%	2.1%	3850
Chía	34.3%	12.7%	44.1%	8.3%	0.6%	1448
Ciénaga	33.1%	17.0%	33.5%	14.3%	2.1%	1515
Cundinamarca	31.2%	14.4%	44.3%	9.3%	0.7%	16373
Córdoba	36.2%	20.8%	28.4%	13.3%	1.3%	13353
Cúcuta	31.7%	16.4%	41.3%	9.8%	0.8%	7403
Dosquebradas	37.5%	14.1%	38.1%	9.5%	0.8%	1863
Duitama	26.8%	13.0%	50.4%	9.3%	0.4%	1408
Envigado	29.8%	13.6%	47.8%	8.1%	0.8%	1415
Facatativá	35.3%	14.1%	41.9%	8.5%	0.3%	1412
Florencia	31.1%	17.0%	40.4%	10.7%	0.8%	2074
Floridablanca	30.9%	12.8%	46.7%	8.9%	0.7%	2586
Fusagasugá	34.5%	15.3%	41.1%	8.3%	0.8%	1232
Girardot	33.7%	21.2%	32.0%	10.7%	2.3%	895
Girón	34.1%	14.8%	40.6%	9.8%	0.6%	1523
Guainía	32.1%	29.4%	27.5%	9.3%	1.7%	517
Guaviare	31.4%	17.7%	36.4%	12.9%	1.5%	914
Huila	29.4%	17.8%	41.0%	11.2%	0.6%	8206
Ibagué	31.3%	14.3%	45.1%	8.7%	0.6%	5546
Ipiales	32.9%	14.5%	43.0%	9.3%	0.3%	1485
Itagüí	37.1%	15.9%	37.0%	8.9%	1.1%	2026
Jamundí	40.3%	17.7%	32.5%	8.8%	0.8%	1103
La Guajira	32.0%	21.3%	32.8%	12.2%	1.7%	3931
Lorica	35.4%	17.7%	33.4%	11.9%	1.7%	1541
Magangué	35.9%	21.5%	27.5%	13.9%	1.2%	1648
Magdalena	33.3%	19.3%	32.0%	13.5%	1.8%	9170
Maicao	34.5%	18.7%	31.3%	13.6%	2.0%	2162
Malambo	31.6%	17.9%	36.6%	12.5%	1.6%	1277
Manizales	33.0%	15.4%	41.6%	9.4%	0.6%	3144
Medellín	38.5%	16.7%	33.8%	9.7%	1.3%	20616
Meta	33.2%	16.9%	38.7%	10.1%	1.1%	6010
Montería	37.3%	18.9%	30.1%	12.7%	1.0%	5508

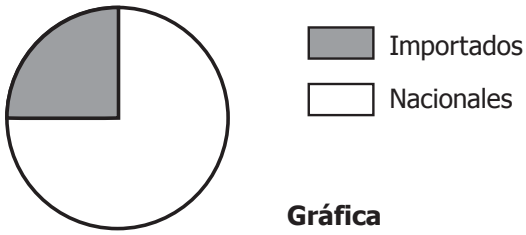
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Mosquera	34.2%	13.7%	42.9%	8.5%	0.7%	1286
Nariño	27.2%	15.1%	43.9%	12.3%	1.5%	9300
Neiva	33.2%	16.9%	39.5%	9.5%	0.8%	3659
Norte de Santander	28.1%	15.6%	44.8%	10.7%	0.7%	8026
Palmira	34.7%	15.9%	40.0%	8.6%	0.8%	2836
Pasto	32.2%	15.0%	42.5%	9.6%	0.7%	4034
Pereira	34.0%	15.7%	40.4%	9.2%	0.7%	4350
Piedecuesta	31.1%	13.8%	44.0%	10.3%	0.8%	1482
Pitalito	31.2%	15.8%	40.8%	11.6%	0.6%	1584
Popayán	32.4%	15.0%	42.9%	9.0%	0.7%	3086
Putumayo	31.6%	18.4%	38.7%	9.8%	1.4%	4143
Quibdó	30.5%	19.9%	34.2%	13.1%	2.3%	1323
Quindío	35.3%	17.0%	35.9%	10.7%	1.1%	2449
Riohacha	35.8%	18.2%	32.1%	12.4%	1.5%	2582
Rionegro	33.4%	16.3%	39.7%	9.5%	1.0%	1185
Risaralda	34.0%	17.4%	37.3%	10.0%	1.3%	2810
Sabaneta	32.9%	15.3%	43.2%	8.0%	0.6%	511
Sahagún	34.8%	20.4%	33.8%	9.5%	1.6%	1213
San Andrés	44.3%	17.3%	24.5%	13.0%	0.9%	555
Santa Marta	35.6%	16.8%	34.5%	11.9%	1.1%	5823
Santander	28.0%	14.4%	46.6%	10.4%	0.6%	8664
Sincelejo	36.4%	18.5%	32.8%	11.2%	1.1%	3218
Soacha	36.1%	16.5%	38.0%	9.0%	0.5%	5620
Sogamoso	31.8%	11.8%	47.0%	8.8%	0.5%	1503
Soledad	33.5%	15.9%	38.5%	11.0%	1.1%	5507
Sucre	36.9%	20.1%	28.9%	13.1%	1.0%	7731
Tolima	32.6%	16.2%	39.6%	10.5%	1.1%	9719
Tuluá	33.5%	16.2%	39.7%	10.0%	0.6%	2129
Tumaco	36.9%	19.7%	24.3%	15.9%	3.3%	2376
Tunja	30.9%	13.4%	46.0%	9.3%	0.4%	1871
Turbo	35.3%	21.0%	26.7%	15.3%	1.7%	2122
Uribia	31.0%	25.1%	25.1%	15.7%	3.1%	1095
Valle del Cauca	34.3%	17.0%	38.4%	9.5%	0.8%	8500
Valledupar	32.7%	17.2%	38.2%	11.1%	0.8%	5289
Vichada	36.1%	20.2%	29.5%	11.4%	2.8%	779
Villavicencio	30.9%	15.6%	42.1%	10.7%	0.7%	5786
Yopal	32.4%	16.2%	41.3%	9.4%	0.7%	2008
Yumbo	36.8%	16.5%	35.7%	10.0%	0.9%	1265
Zipaquirá	29.8%	12.9%	46.9%	9.8%	0.7%	1284
Colombia	33.5%	16.5%	38.2%	10.6%	1.1%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 33.

La siguiente gráfica presenta información sobre los productos nacionales e importados que se ofrecen en una feria.



Gráfica

¿Cuál de las siguientes afirmaciones es correcta?

A. $\frac{1}{4}$ de los productos son importados.
B. $\frac{1}{3}$ de los productos son nacionales.
C. $\frac{4}{4}$ de los productos son nacionales.
D. $\frac{4}{3}$ de los productos son importados.

• Estructura

Competencia	Comunicación
Componente	Numérico - variacional
Afirmación	Traducir relaciones numéricas expresadas gráfica y simbólicamente.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	31.3%	24.6%	25.4%	16.3%	2.5%	978
Antioquia	42.3%	23.6%	19.6%	13.0%	1.5%	29375
Apartadó	40.5%	22.9%	20.7%	13.4%	2.5%	1757
Arauca	42.1%	22.5%	21.9%	12.5%	1.0%	2680
Armenia	44.0%	24.2%	18.7%	11.7%	1.4%	2579
Atlántico	38.0%	22.9%	22.1%	14.1%	3.0%	5977
Barrancabermeja	48.1%	20.3%	18.7%	11.3%	1.6%	2488
Barranquilla	43.7%	22.4%	20.3%	12.3%	1.4%	12401
Bello	48.0%	21.2%	18.4%	11.5%	0.9%	3838
Bogotá, D.C.	51.9%	20.0%	16.7%	10.4%	1.1%	66881
Bolívar	33.0%	25.3%	23.5%	15.9%	2.4%	11164
Boyacá	51.2%	21.2%	16.7%	10.0%	0.8%	9267
Bucaramanga	57.7%	19.1%	13.7%	8.9%	0.7%	5302
Buenaventura	40.5%	23.9%	18.3%	14.5%	2.7%	4159
Buga	48.2%	20.6%	17.9%	11.6%	1.6%	1238
Caldas	43.2%	22.5%	20.1%	13.4%	0.8%	5750
Cali	47.4%	22.1%	17.9%	11.3%	1.3%	19640
Caquetá	40.0%	22.2%	22.5%	14.0%	1.3%	3262
Cartagena	42.5%	23.4%	20.0%	12.3%	1.9%	11456
Cartago	43.2%	22.6%	20.5%	12.4%	1.3%	1274
Casanare	43.3%	23.4%	19.8%	12.2%	1.2%	3072
Cauca	43.9%	21.3%	19.0%	13.5%	2.2%	12625
Cesar	38.9%	23.3%	22.0%	14.4%	1.3%	8484
Chocó	38.3%	23.2%	21.5%	14.5%	2.4%	3850
Chía	55.2%	18.0%	15.5%	10.4%	0.9%	1448
Ciénaga	37.4%	23.3%	23.2%	13.9%	2.2%	1515
Cundinamarca	49.9%	21.0%	17.6%	10.7%	0.7%	16373
Córdoba	32.8%	25.7%	24.0%	15.9%	1.5%	13353
Cúcuta	49.7%	20.8%	18.1%	10.4%	1.1%	7403
Dosquebradas	47.9%	22.1%	17.8%	11.5%	0.7%	1863
Duitama	63.6%	15.8%	11.1%	9.2%	0.3%	1408
Envigado	61.1%	18.0%	11.9%	8.3%	0.8%	1415
Facatativá	52.1%	20.7%	16.5%	10.3%	0.4%	1412
Florencia	40.5%	25.0%	22.1%	11.5%	0.8%	2074
Floridablanca	57.8%	18.6%	14.5%	8.2%	0.9%	2586
Fusagasugá	46.2%	23.5%	18.4%	10.9%	1.1%	1232
Girardot	41.6%	22.3%	21.0%	12.1%	3.0%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	47.5%	23.2%	18.1%	10.3%	0.9%	1523
Guainía	35.0%	25.1%	21.3%	15.5%	3.1%	517
Guaviare	37.9%	24.3%	24.4%	11.9%	1.5%	914
Huila	45.2%	22.8%	19.6%	11.7%	0.7%	8206
Ibagué	50.1%	19.9%	17.7%	11.5%	0.8%	5546
Ipiales	52.2%	22.7%	14.9%	9.7%	0.5%	1485
Itagüí	46.1%	22.4%	20.0%	10.3%	1.3%	2026
Jamundí	41.1%	23.9%	20.1%	14.1%	0.7%	1103
La Guajira	38.0%	22.5%	22.5%	14.6%	2.4%	3931
Lorica	40.0%	23.2%	22.5%	12.2%	2.1%	1541
Magangué	34.6%	24.8%	22.9%	16.1%	1.5%	1648
Magdalena	37.6%	23.2%	21.7%	15.3%	2.2%	9170
Maicao	35.0%	24.4%	22.6%	15.7%	2.3%	2162
Malambo	43.6%	21.8%	17.5%	15.7%	1.4%	1277
Manizales	52.4%	20.4%	16.1%	10.4%	0.6%	3144
Medellín	42.7%	24.0%	19.9%	12.0%	1.4%	20616
Meta	41.3%	24.4%	21.0%	11.9%	1.4%	6010
Montería	39.5%	24.6%	21.1%	13.5%	1.4%	5508
Mosquera	51.0%	20.4%	17.6%	10.5%	0.5%	1286
Nariño	51.8%	20.1%	15.0%	11.5%	1.6%	9300
Neiva	44.4%	22.6%	20.4%	11.9%	0.7%	3659
Norte de Santander	49.9%	22.2%	17.2%	9.9%	0.9%	8026
Palmira	48.7%	22.4%	17.3%	10.5%	1.1%	2836
Pasto	53.5%	22.0%	14.7%	9.2%	0.6%	4034
Pereira	49.1%	20.9%	17.6%	11.5%	0.9%	4350
Piedecuesta	54.9%	21.3%	14.9%	8.3%	0.7%	1482
Pitalito	44.5%	23.0%	19.6%	12.2%	0.6%	1584
Popayán	50.9%	20.5%	16.9%	10.9%	0.8%	3086
Putumayo	41.6%	26.0%	19.3%	11.3%	1.7%	4143
Quibdó	40.2%	23.8%	19.0%	14.1%	2.9%	1323
Quindío	40.3%	25.2%	19.8%	13.5%	1.2%	2449
Riohacha	36.3%	25.0%	22.2%	14.6%	1.9%	2582
Rionegro	57.2%	18.3%	15.0%	8.4%	1.1%	1185
Risaralda	44.6%	21.3%	19.8%	12.9%	1.4%	2810
Sabaneta	56.8%	18.4%	14.7%	9.4%	0.8%	511
Sahagún	35.0%	22.8%	22.7%	17.6%	2.0%	1213
San Andrés	36.0%	29.2%	23.8%	9.9%	1.1%	555
Santa Marta	40.0%	24.6%	21.8%	12.2%	1.4%	5823
Santander	52.9%	20.0%	16.4%	10.1%	0.6%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	41.0%	25.1%	20.9%	11.8%	1.2%	3218
Soacha	45.1%	23.1%	19.8%	11.2%	0.7%	5620
Sogamoso	55.7%	21.8%	13.9%	8.1%	0.5%	1503
Soledad	44.5%	22.0%	19.9%	12.1%	1.5%	5507
Sucre	35.4%	24.8%	23.6%	14.8%	1.4%	7731
Tolima	42.6%	22.4%	20.6%	13.0%	1.4%	9719
Tuluá	45.0%	21.4%	20.9%	12.0%	0.7%	2129
Tumaco	31.7%	23.6%	25.1%	15.8%	3.8%	2376
Tunja	56.4%	20.2%	14.0%	9.0%	0.4%	1871
Turbo	31.4%	26.2%	24.6%	16.1%	1.7%	2122
Uribia	33.8%	25.0%	23.4%	14.9%	2.9%	1095
Valle del Cauca	43.0%	23.2%	20.2%	12.7%	0.9%	8500
Valledupar	43.6%	20.9%	20.7%	13.6%	1.2%	5289
Vichada	31.3%	26.2%	23.9%	15.1%	3.5%	779
Villavicencio	50.4%	21.2%	16.6%	10.7%	1.0%	5786
Yopal	44.9%	23.4%	18.9%	11.7%	1.1%	2008
Yumbo	43.2%	22.6%	20.3%	12.7%	1.2%	1265
Zipaquirá	58.3%	16.1%	14.4%	10.3%	0.9%	1284
Colombia	45.2%	22.3%	19.1%	12.1%	1.3%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 34.

Un dado con forma de cubo tiene dos caras azules, dos verdes, una amarilla y una roja.

La probabilidad de que al lanzar el dado, éste muestre una cara azul es

A. igual a la probabilidad de que muestre una cara roja.
B. la mitad de la probabilidad de que muestre una cara verde.
C. la mitad de la probabilidad de que muestre una cara roja.
D. igual a la probabilidad de que muestre una cara verde.

• Estructura

Competencia	Razonamiento
Componente	Aleatorio
Afirmación	Conjeturar y argumentar acerca de la posibilidad de ocurrencia de eventos.
Nivel de desempeño	Avanzado
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	17.7%	26.7%	24.8%	27.6%	3.2%	978
Antioquia	18.0%	25.5%	20.6%	33.9%	1.9%	29375
Apartadó	17.3%	26.1%	20.3%	33.2%	3.1%	1757
Arauca	15.1%	25.8%	21.2%	36.3%	1.6%	2680
Armenia	15.9%	24.7%	19.4%	38.7%	1.3%	2579
Atlántico	18.1%	24.9%	22.1%	31.5%	3.5%	5977
Barrancabermeja	16.4%	24.9%	20.3%	36.3%	2.0%	2488
Barranquilla	18.0%	25.4%	19.6%	35.2%	1.8%	12401
Bello	18.3%	26.3%	17.5%	36.8%	1.1%	3838
Bogotá, D.C.	15.5%	24.6%	17.7%	40.8%	1.4%	66881
Bolívar	18.6%	25.6%	24.0%	28.8%	3.0%	11164
Boyacá	15.4%	24.7%	20.1%	38.8%	1.0%	9267
Bucaramanga	14.2%	23.9%	16.9%	43.6%	1.3%	5302
Buenaventura	17.9%	24.9%	21.0%	33.1%	3.1%	4159
Buga	17.0%	24.8%	20.6%	36.3%	1.3%	1238
Caldas	16.3%	24.9%	21.9%	35.6%	1.2%	5750
Cali	16.7%	25.5%	18.5%	37.6%	1.7%	19640
Caquetá	17.4%	26.9%	21.5%	32.6%	1.6%	3262
Cartagena	18.6%	25.4%	19.1%	34.6%	2.2%	11456
Cartago	16.8%	23.0%	18.7%	39.7%	1.8%	1274
Casanare	17.8%	28.0%	20.9%	31.9%	1.3%	3072
Cauca	17.5%	24.8%	20.3%	34.8%	2.7%	12625
Cesar	18.1%	24.2%	21.2%	34.8%	1.7%	8484
Chocó	18.0%	26.2%	22.8%	30.3%	2.7%	3850
Chía	14.3%	22.8%	15.0%	47.1%	0.8%	1448
Ciénaga	17.2%	23.5%	22.5%	33.4%	3.4%	1515
Cundinamarca	14.9%	24.8%	18.5%	40.8%	1.1%	16373
Córdoba	18.4%	26.4%	23.8%	29.5%	1.9%	13353
Cúcuta	17.0%	25.2%	19.6%	36.7%	1.5%	7403
Dosquebradas	16.6%	25.6%	19.7%	37.1%	1.0%	1863
Duitama	13.8%	21.3%	18.0%	46.0%	0.9%	1408
Envigado	14.3%	20.2%	15.1%	49.3%	1.2%	1415
Facatativá	15.2%	25.1%	18.4%	40.7%	0.7%	1412
Florencia	18.9%	26.7%	20.9%	32.0%	1.4%	2074
Floridablanca	15.4%	24.6%	16.1%	42.7%	1.2%	2586
Fusagasugá	15.3%	26.2%	17.5%	39.9%	1.2%	1232
Girardot	20.0%	23.6%	16.5%	36.2%	3.7%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	16.9%	23.8%	20.2%	38.3%	0.8%	1523
Guainía	18.8%	23.0%	24.8%	30.2%	3.3%	517
Guaviare	15.8%	25.7%	21.9%	33.8%	2.8%	914
Huila	16.1%	25.3%	21.6%	36.0%	1.0%	8206
Ibagué	15.6%	25.2%	18.1%	40.0%	1.1%	5546
Ipiales	15.7%	27.7%	21.4%	34.3%	0.8%	1485
Itagüí	18.6%	25.7%	20.7%	33.4%	1.6%	2026
Jamundí	17.0%	29.6%	22.5%	29.8%	1.1%	1103
La Guajira	19.7%	24.4%	21.8%	31.5%	2.6%	3931
Lorica	18.3%	23.4%	21.5%	34.3%	2.4%	1541
Magangué	20.0%	26.5%	22.3%	29.7%	1.5%	1648
Magdalena	18.2%	24.8%	22.2%	32.0%	2.8%	9170
Maicao	18.0%	25.1%	24.1%	30.2%	2.6%	2162
Malambo	17.1%	22.2%	20.1%	38.1%	2.4%	1277
Manizales	16.2%	25.8%	17.9%	39.2%	0.9%	3144
Medellín	17.0%	26.1%	19.8%	35.2%	1.9%	20616
Meta	17.1%	26.5%	21.7%	33.0%	1.6%	6010
Montería	17.9%	24.7%	23.3%	32.4%	1.7%	5508
Mosquera	14.0%	24.0%	17.5%	43.5%	1.0%	1286
Nariño	15.8%	24.5%	19.8%	37.9%	2.0%	9300
Neiva	17.5%	26.5%	18.4%	36.4%	1.2%	3659
Norte de Santander	16.6%	25.2%	20.0%	37.0%	1.2%	8026
Palmira	15.8%	24.8%	17.5%	40.8%	1.1%	2836
Pasto	14.9%	24.9%	19.5%	39.7%	1.0%	4034
Pereira	16.9%	24.1%	19.4%	38.3%	1.2%	4350
Piedecuesta	14.8%	24.6%	19.3%	40.1%	1.2%	1482
Pitalito	17.0%	26.2%	20.4%	35.3%	1.1%	1584
Popayán	15.9%	26.0%	19.2%	37.7%	1.3%	3086
Putumayo	17.4%	25.8%	22.3%	32.3%	2.1%	4143
Quibdó	16.9%	24.0%	20.0%	36.1%	2.9%	1323
Quindío	18.0%	26.8%	20.0%	34.0%	1.2%	2449
Riohacha	17.8%	27.0%	22.4%	30.7%	2.1%	2582
Rionegro	16.8%	26.2%	16.0%	39.7%	1.2%	1185
Risaralda	16.6%	24.6%	21.0%	36.1%	1.6%	2810
Sabaneta	13.5%	25.0%	18.2%	42.1%	1.2%	511
Sahagún	17.6%	26.4%	21.8%	32.1%	2.1%	1213
San Andrés	17.3%	25.4%	21.8%	34.4%	1.1%	555
Santa Marta	18.5%	25.4%	20.1%	34.2%	1.9%	5823
Santander	15.5%	23.8%	18.8%	40.9%	1.0%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	17.7%	25.7%	21.3%	33.7%	1.7%	3218
Soacha	16.9%	26.9%	20.1%	35.1%	1.0%	5620
Sogamoso	13.1%	26.3%	17.8%	42.4%	0.3%	1503
Soledad	18.3%	24.1%	19.9%	36.0%	1.7%	5507
Sucre	18.1%	25.2%	23.2%	31.7%	1.8%	7731
Tolima	16.6%	24.9%	20.9%	35.8%	1.8%	9719
Tuluá	16.3%	25.4%	17.6%	39.6%	1.1%	2129
Tumaco	18.7%	25.8%	23.9%	27.1%	4.5%	2376
Tunja	13.7%	21.8%	18.8%	45.1%	0.6%	1871
Turbo	20.0%	26.9%	23.7%	27.3%	2.2%	2122
Uribia	18.8%	25.1%	24.7%	27.9%	3.4%	1095
Valle del Cauca	16.4%	25.7%	20.0%	36.5%	1.4%	8500
Valledupar	16.7%	25.2%	19.7%	37.0%	1.4%	5289
Vichada	18.5%	25.3%	22.5%	31.1%	2.7%	779
Villavicencio	16.7%	25.9%	19.3%	36.6%	1.4%	5786
Yopal	16.3%	25.7%	21.2%	35.3%	1.4%	2008
Yumbo	19.0%	25.5%	19.2%	35.3%	1.0%	1265
Zipaquirá	13.1%	22.4%	17.4%	46.0%	1.0%	1284
Colombia	16.8%	25.2%	20.0%	36.3%	1.7%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 35.

La tabla representa el número de estudiantes (niños y niñas), por grado, que recibieron medallas en una izada de bandera

Grado	Número de niños que recibieron medallas	Número de niñas que recibieron medallas
Primero	2	3
Segundo	6	3
Tercero	5	5
Cuarto	1	2
Quinto	4	5

Tabla

¿Cuál fue el grado en el que más estudiantes recibieron medallas?

A. Primero.
B. Segundo.
C. Tercero.
D. Quinto.

• Estructura

Competencia	Resolución
Componente	Aleatorio
Afirmación	Resolver problemas que requieren encontrar y/o dar significado a la medida de tendencia central de un conjunto de datos.
Nivel de desempeño	Mínimo
Respuesta Correcta	C

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	9.1%	21.9%	49.2%	17.3%	2.6%	978
Antioquia	6.4%	19.0%	60.1%	12.7%	1.7%	29375
Apartadó	8.1%	19.6%	57.3%	11.8%	3.2%	1757
Arauca	6.4%	17.0%	64.7%	10.9%	1.0%	2680
Armenia	7.3%	17.5%	62.2%	11.7%	1.3%	2579
Atlántico	8.3%	18.8%	53.6%	16.1%	3.2%	5977
Barrancabermeja	7.5%	20.4%	60.0%	10.1%	2.0%	2488
Barranquilla	6.9%	18.6%	61.7%	11.2%	1.6%	12401
Bello	6.1%	16.9%	65.9%	10.1%	1.0%	3838
Bogotá, D.C.	4.9%	15.1%	70.2%	8.7%	1.2%	66881
Bolívar	10.2%	21.3%	47.5%	18.0%	3.0%	11164
Boyacá	5.1%	17.0%	66.7%	10.3%	0.9%	9267
Bucaramanga	4.7%	15.3%	71.2%	7.9%	0.8%	5302
Buenaventura	8.1%	17.6%	56.2%	14.5%	3.7%	4159
Buga	5.3%	19.1%	65.1%	9.0%	1.5%	1238
Caldas	5.7%	19.3%	62.0%	12.0%	1.0%	5750
Cali	6.0%	17.9%	65.0%	9.6%	1.6%	19640
Caquetá	6.9%	19.9%	58.4%	13.3%	1.5%	3262
Cartagena	8.6%	19.2%	57.8%	12.5%	2.0%	11456
Cartago	6.9%	17.7%	63.3%	10.5%	1.5%	1274
Casanare	5.2%	18.7%	65.3%	9.6%	1.2%	3072
Cauca	5.8%	19.2%	58.5%	14.1%	2.3%	12625
Cesar	7.5%	20.9%	55.1%	15.0%	1.5%	8484
Chocó	8.6%	21.2%	49.8%	17.9%	2.5%	3850
Chía	4.2%	13.3%	73.5%	8.0%	1.0%	1448
Ciénaga	8.1%	20.1%	54.2%	14.7%	2.9%	1515
Cundinamarca	4.7%	16.3%	69.0%	9.0%	0.9%	16373
Córdoba	9.1%	20.5%	51.2%	17.3%	2.0%	13353
Cúcuta	5.7%	17.1%	65.8%	10.4%	1.1%	7403
Dosquebradas	5.3%	18.0%	64.9%	10.8%	1.0%	1863
Duitama	3.8%	16.5%	71.9%	7.1%	0.7%	1408
Envigado	5.9%	14.5%	71.4%	7.6%	0.7%	1415
Facatativá	3.5%	17.3%	70.6%	8.1%	0.4%	1412
Florencia	7.7%	16.8%	60.8%	13.5%	1.3%	2074
Floridablanca	4.3%	15.7%	69.5%	9.2%	1.3%	2586
Fusagasugá	4.5%	18.6%	66.6%	8.8%	1.5%	1232
Girardot	6.8%	20.2%	58.4%	11.3%	3.2%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	7.4%	16.5%	64.5%	10.5%	1.2%	1523
Guainía	5.0%	20.9%	60.5%	11.0%	2.5%	517
Guaviare	7.9%	18.3%	59.8%	12.3%	1.8%	914
Huila	5.3%	17.5%	65.3%	11.0%	0.9%	8206
Ibagué	5.2%	16.8%	68.3%	9.0%	0.8%	5546
Ipiales	4.2%	16.7%	68.8%	9.6%	0.8%	1485
Itagüí	8.0%	18.1%	60.1%	12.4%	1.3%	2026
Jamundí	8.8%	21.8%	56.0%	12.2%	1.2%	1103
La Guajira	8.5%	19.7%	53.0%	16.2%	2.6%	3931
Lorica	7.6%	20.2%	55.7%	14.5%	1.9%	1541
Magangué	9.9%	21.2%	51.4%	15.7%	1.8%	1648
Magdalena	8.7%	20.4%	51.3%	16.8%	2.7%	9170
Maicao	8.2%	20.8%	51.3%	17.1%	2.5%	2162
Malambo	6.9%	17.6%	60.8%	12.4%	2.3%	1277
Manizales	4.8%	16.0%	69.0%	9.5%	0.7%	3144
Medellín	8.4%	18.7%	59.1%	12.1%	1.6%	20616
Meta	6.8%	18.6%	60.7%	12.0%	1.8%	6010
Montería	8.2%	21.0%	55.2%	14.1%	1.5%	5508
Mosquera	4.2%	13.5%	73.3%	8.1%	0.9%	1286
Nariño	5.3%	16.6%	65.9%	10.4%	1.8%	9300
Neiva	6.1%	18.6%	63.5%	10.5%	1.1%	3659
Norte de Santander	5.7%	16.4%	65.9%	10.9%	1.1%	8026
Palmira	4.8%	17.4%	67.7%	9.2%	1.0%	2836
Pasto	4.1%	17.2%	70.1%	7.8%	0.8%	4034
Pereira	4.8%	17.0%	67.5%	9.6%	1.1%	4350
Piedecuesta	5.8%	16.1%	65.2%	11.4%	1.5%	1482
Pitalito	5.4%	20.8%	62.8%	10.2%	0.9%	1584
Popayán	5.0%	18.9%	66.1%	8.9%	1.1%	3086
Putumayo	6.1%	19.2%	60.3%	12.5%	1.9%	4143
Quibdó	8.4%	20.6%	52.5%	15.6%	2.9%	1323
Quindío	6.7%	18.9%	61.1%	11.8%	1.4%	2449
Riohacha	8.4%	20.7%	50.9%	17.6%	2.3%	2582
Rionegro	4.9%	13.9%	69.5%	10.7%	0.9%	1185
Risaralda	5.6%	16.9%	63.1%	12.8%	1.6%	2810
Sabaneta	3.9%	13.5%	71.6%	9.6%	1.4%	511
Sahagún	6.2%	19.9%	59.2%	12.9%	1.8%	1213
San Andrés	7.0%	23.1%	54.8%	12.8%	2.3%	555
Santa Marta	7.7%	19.2%	57.9%	13.4%	1.9%	5823
Santander	4.9%	16.7%	67.6%	9.9%	0.8%	8664

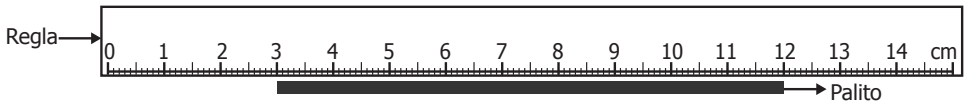
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	8.8%	19.0%	58.3%	12.4%	1.5%	3218
Soacha	5.9%	17.8%	65.4%	9.8%	1.0%	5620
Sogamoso	5.9%	15.4%	70.6%	7.6%	0.5%	1503
Soledad	7.1%	18.3%	61.5%	11.4%	1.7%	5507
Sucre	8.2%	20.3%	53.2%	16.8%	1.5%	7731
Tolima	5.7%	18.6%	62.1%	12.0%	1.5%	9719
Tuluá	4.6%	17.7%	67.0%	9.9%	0.8%	2129
Tumaco	12.1%	20.8%	44.3%	19.1%	3.7%	2376
Tunja	4.7%	15.8%	70.5%	8.5%	0.5%	1871
Turbo	11.0%	20.8%	48.8%	17.4%	1.9%	2122
Uribia	9.5%	22.8%	40.0%	23.9%	3.7%	1095
Valle del Cauca	6.7%	18.6%	61.8%	12.0%	0.9%	8500
Valledupar	6.5%	18.5%	61.9%	11.7%	1.3%	5289
Vichada	6.4%	18.4%	53.8%	18.5%	3.0%	779
Villavicencio	6.0%	17.6%	65.3%	9.8%	1.3%	5786
Yopal	6.5%	16.6%	65.0%	10.6%	1.2%	2008
Yumbo	5.9%	17.7%	64.2%	11.1%	1.1%	1265
Zipaquirá	3.5%	15.4%	71.0%	9.5%	0.6%	1284
Colombia	6.4%	18.0%	62.3%	11.7%	1.5%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 36.

Para medir la longitud de un palito de madera, Johana coloca la regla como se muestra en la figura.



Figura

¿Cuál es la longitud del palito?

A. 10 cm.
B. 9 cm.
C. 6 cm.
D. 3 cm.

• Estructura

Competencia	Comunicación
Componente	Espacial - métrico
Afirmación	Identificar unidades tanto estandarizadas como no convencionales apropiadas para diferentes mediciones y establecer relaciones entre ellas.
Nivel de desempeño	Avanzado
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	16.8%	20.4%	20.4%	39.3%	3.1%	978
Antioquia	19.5%	19.9%	17.1%	41.7%	1.7%	29375
Apartadó	19.1%	17.9%	16.3%	43.9%	2.8%	1757
Arauca	18.8%	18.1%	15.1%	47.0%	1.0%	2680
Armenia	19.5%	22.8%	16.4%	39.9%	1.4%	2579
Atlántico	21.8%	22.0%	16.0%	37.1%	3.2%	5977
Barrancabermeja	22.5%	22.5%	15.6%	37.4%	1.9%	2488
Barranquilla	22.1%	21.6%	15.3%	39.6%	1.5%	12401
Bello	21.6%	20.7%	15.8%	40.9%	1.0%	3838
Bogotá, D.C.	18.9%	20.4%	15.1%	44.3%	1.3%	66881
Bolívar	21.2%	20.6%	17.2%	38.3%	2.7%	11164
Boyacá	17.8%	19.1%	16.2%	45.9%	1.0%	9267
Bucaramanga	19.4%	21.0%	14.9%	43.6%	1.1%	5302
Buenaventura	20.2%	19.4%	13.9%	43.1%	3.3%	4159
Buga	19.6%	21.6%	16.9%	40.1%	1.8%	1238
Caldas	18.6%	19.7%	17.9%	42.7%	1.1%	5750
Cali	20.3%	21.5%	15.1%	41.5%	1.6%	19640
Caquetá	18.0%	17.6%	18.2%	44.7%	1.4%	3262
Cartagena	22.3%	21.6%	15.0%	39.0%	2.0%	11456
Cartago	19.4%	20.1%	16.2%	42.5%	1.8%	1274
Casanare	18.4%	18.5%	17.3%	44.5%	1.3%	3072
Cauca	17.5%	18.3%	16.1%	45.6%	2.5%	12625
Cesar	20.1%	19.8%	16.2%	42.4%	1.4%	8484
Chocó	17.6%	18.7%	16.7%	44.1%	2.8%	3850
Chía	17.1%	21.5%	14.4%	46.1%	0.8%	1448
Ciénaga	19.7%	22.9%	14.4%	40.1%	2.9%	1515
Cundinamarca	17.2%	19.6%	15.6%	46.5%	1.1%	16373
Córdoba	19.2%	20.8%	19.0%	39.2%	1.9%	13353
Cúcuta	20.5%	22.4%	14.9%	40.7%	1.4%	7403
Dosquebradas	20.7%	21.0%	15.7%	41.4%	1.1%	1863
Duitama	18.4%	19.7%	14.8%	46.5%	0.5%	1408
Envigado	16.8%	20.1%	13.8%	48.3%	1.1%	1415
Facatativá	18.0%	19.1%	16.9%	45.4%	0.6%	1412
Florencia	20.0%	20.2%	17.3%	41.4%	1.2%	2074
Floridablanca	18.7%	21.4%	15.7%	43.1%	1.1%	2586
Fusagasugá	18.9%	20.2%	15.4%	44.1%	1.4%	1232
Girardot	21.0%	20.1%	16.1%	38.7%	4.1%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	20.0%	20.6%	17.2%	40.9%	1.2%	1523
Guainía	21.5%	16.4%	17.6%	41.8%	2.7%	517
Guaviare	17.4%	20.1%	17.7%	42.3%	2.4%	914
Huila	17.1%	19.2%	16.8%	46.1%	0.8%	8206
Ibagué	20.1%	18.8%	14.6%	45.4%	1.2%	5546
Ipiales	16.2%	19.3%	17.2%	46.3%	0.9%	1485
Itagüí	18.6%	22.0%	16.7%	41.4%	1.3%	2026
Jamundí	20.5%	21.5%	19.2%	37.7%	1.1%	1103
La Guajira	20.4%	21.2%	16.3%	39.5%	2.7%	3931
Lorica	20.8%	19.5%	18.9%	38.5%	2.3%	1541
Magangué	21.3%	20.2%	17.5%	39.5%	1.5%	1648
Magdalena	18.9%	21.0%	16.6%	41.1%	2.4%	9170
Maicao	20.7%	23.2%	17.9%	35.6%	2.7%	2162
Malambo	21.5%	19.0%	15.0%	42.4%	2.2%	1277
Manizales	20.2%	21.1%	16.4%	41.6%	0.7%	3144
Medellín	20.7%	21.4%	17.9%	38.4%	1.6%	20616
Meta	18.4%	19.4%	17.5%	43.0%	1.7%	6010
Montería	22.0%	22.4%	16.6%	37.4%	1.6%	5508
Mosquera	18.0%	18.4%	16.9%	46.0%	0.9%	1286
Nariño	16.2%	17.4%	15.6%	48.9%	1.8%	9300
Neiva	20.8%	20.2%	17.2%	40.7%	1.1%	3659
Norte de Santander	18.1%	19.7%	15.3%	45.9%	1.0%	8026
Palmira	19.1%	20.6%	15.3%	43.9%	1.1%	2836
Pasto	18.0%	20.6%	15.8%	44.8%	0.8%	4034
Pereira	20.1%	21.5%	15.4%	41.7%	1.3%	4350
Piedecuesta	18.4%	17.9%	16.2%	46.6%	0.9%	1482
Pitalito	18.4%	21.1%	15.8%	44.0%	0.7%	1584
Popayán	17.0%	20.0%	16.9%	45.0%	1.1%	3086
Putumayo	17.5%	17.1%	17.9%	45.7%	1.8%	4143
Quibdó	19.0%	23.0%	15.6%	39.7%	2.7%	1323
Quindío	20.0%	20.9%	16.2%	41.5%	1.3%	2449
Riohacha	20.9%	22.0%	17.4%	37.6%	2.1%	2582
Rionegro	19.2%	20.8%	15.7%	43.4%	1.0%	1185
Risaralda	17.9%	19.6%	15.7%	45.1%	1.7%	2810
Sabaneta	19.8%	22.1%	16.0%	40.5%	1.6%	511
Sahagún	19.6%	23.2%	16.6%	38.9%	1.7%	1213
San Andrés	26.3%	22.2%	16.4%	34.2%	0.9%	555
Santa Marta	20.6%	22.1%	16.0%	39.6%	1.8%	5823
Santander	17.3%	19.1%	15.7%	47.1%	0.9%	8664

Continúa en la siguiente página

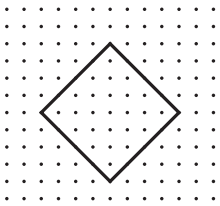
ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	21.2%	21.3%	17.4%	38.4%	1.7%	3218
Soacha	20.8%	21.3%	15.7%	41.0%	1.3%	5620
Sogamoso	19.7%	19.6%	15.6%	44.8%	0.3%	1503
Soledad	21.6%	21.7%	14.5%	40.3%	1.9%	5507
Sucre	20.7%	20.7%	16.7%	40.5%	1.3%	7731
Tolima	18.2%	18.9%	16.8%	44.6%	1.5%	9719
Tuluá	19.4%	18.6%	16.7%	44.3%	0.8%	2129
Tumaco	19.9%	20.4%	17.0%	38.8%	3.8%	2376
Tunja	17.2%	20.1%	15.2%	46.7%	0.8%	1871
Turbo	22.6%	21.0%	18.7%	35.6%	2.1%	2122
Uribia	21.7%	19.5%	18.1%	37.0%	3.7%	1095
Valle del Cauca	20.1%	20.2%	15.8%	42.8%	1.0%	8500
Valledupar	20.9%	19.4%	14.8%	43.3%	1.5%	5289
Vichada	21.1%	15.8%	18.5%	41.3%	3.3%	779
Villavicencio	19.1%	20.1%	16.6%	42.8%	1.3%	5786
Yopal	21.1%	20.1%	17.1%	40.6%	1.1%	2008
Yumbo	21.1%	20.2%	18.9%	38.8%	0.9%	1265
Zipaquirá	17.4%	19.6%	16.0%	45.6%	1.2%	1284
Colombia	19.4%	20.3%	16.2%	42.5%	1.6%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

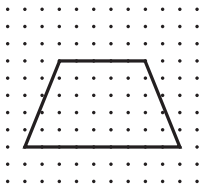
• Pregunta 37.

Un polígono regular tiene todos sus lados de la misma medida. ¿Cuál de los siguientes polígonos es regular?

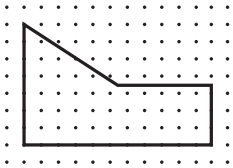
A.



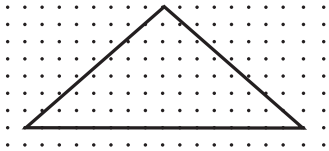
B.



C.



D.



• Estructura

Competencia	Razonamiento
Componente	Espacial - métrico
Afirmación	Comparar y clasificar objetos tridimensionales y figuras bidimensionales de acuerdo con sus componentes.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	41.6%	17.3%	25.2%	13.3%	2.7%	978
Antioquia	55.1%	15.1%	15.8%	12.5%	1.5%	29375
Apartadó	55.0%	16.9%	12.1%	13.4%	2.6%	1757
Arauca	54.9%	16.2%	15.4%	12.5%	1.0%	2680
Armenia	57.2%	14.9%	15.7%	11.2%	1.0%	2579
Atlántico	53.5%	16.7%	13.4%	13.8%	2.6%	5977
Barrancabermeja	55.8%	14.8%	14.8%	13.1%	1.5%	2488
Barranquilla	56.4%	14.5%	15.2%	12.9%	1.0%	12401
Bello	60.6%	13.0%	14.5%	11.4%	0.6%	3838
Bogotá, D.C.	57.9%	13.2%	16.8%	11.0%	1.0%	66881
Bolívar	50.7%	16.2%	14.8%	15.9%	2.5%	11164
Boyacá	56.7%	13.3%	18.1%	11.3%	0.6%	9267
Bucaramanga	62.6%	12.5%	13.2%	10.9%	0.7%	5302
Buenaventura	54.0%	14.2%	14.9%	14.3%	2.6%	4159
Buga	55.5%	15.2%	15.8%	12.4%	1.1%	1238
Caldas	56.0%	15.0%	16.1%	12.1%	0.9%	5750
Cali	57.8%	14.2%	15.2%	11.5%	1.3%	19640
Caquetá	55.1%	15.5%	15.2%	13.0%	1.3%	3262
Cartagena	56.4%	14.0%	14.1%	13.7%	1.8%	11456
Cartago	56.1%	15.8%	14.8%	12.1%	1.2%	1274
Casanare	53.8%	15.4%	16.8%	12.8%	1.2%	3072
Cauca	54.9%	13.5%	16.6%	13.0%	2.0%	12625
Cesar	53.2%	15.9%	15.8%	14.1%	0.9%	8484
Chocó	53.5%	14.3%	13.8%	16.6%	1.8%	3850
Chía	63.0%	11.8%	15.9%	8.6%	0.7%	1448
Ciénaga	53.0%	15.2%	15.2%	14.4%	2.1%	1515
Cundinamarca	58.8%	12.4%	16.9%	11.2%	0.8%	16373
Córdoba	49.9%	16.3%	16.3%	16.2%	1.3%	13353
Cúcuta	57.1%	15.5%	15.0%	11.5%	0.9%	7403
Dosquebradas	59.4%	13.3%	14.8%	11.6%	0.9%	1863
Duitama	65.2%	12.4%	13.6%	8.5%	0.3%	1408
Envigado	66.7%	11.9%	11.9%	8.9%	0.6%	1415
Facatativá	57.9%	12.7%	16.4%	12.6%	0.4%	1412
Florencia	54.4%	13.9%	17.5%	13.2%	1.0%	2074
Floridablanca	64.7%	11.9%	12.7%	10.1%	0.7%	2586
Fusagasugá	54.1%	14.2%	19.5%	11.4%	0.8%	1232
Girardot	52.1%	14.0%	19.0%	12.1%	2.9%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	54.4%	16.3%	16.0%	12.6%	0.7%	1523
Guainía	43.3%	16.2%	21.9%	15.5%	3.1%	517
Guaviare	53.2%	15.3%	14.8%	15.1%	1.6%	914
Huila	54.9%	13.4%	18.6%	12.4%	0.6%	8206
Ibagué	60.8%	13.0%	14.4%	11.0%	0.8%	5546
Ipiales	58.6%	14.4%	16.6%	10.0%	0.5%	1485
Itagüí	59.8%	14.9%	14.1%	10.1%	1.1%	2026
Jamundí	51.1%	15.5%	17.4%	14.6%	1.4%	1103
La Guajira	51.2%	15.5%	15.0%	16.5%	1.8%	3931
Lorica	53.5%	17.7%	12.5%	14.5%	1.8%	1541
Magangué	52.2%	15.1%	15.7%	15.7%	1.2%	1648
Magdalena	53.7%	15.2%	13.3%	15.8%	2.0%	9170
Maicao	45.7%	16.6%	19.0%	15.6%	3.1%	2162
Malambo	54.9%	14.7%	16.8%	12.4%	1.2%	1277
Manizales	58.6%	13.2%	16.3%	11.2%	0.6%	3144
Medellín	55.9%	15.8%	14.8%	12.3%	1.3%	20616
Meta	53.8%	15.2%	16.7%	13.0%	1.3%	6010
Montería	53.1%	16.0%	15.6%	14.1%	1.2%	5508
Mosquera	59.3%	14.0%	15.6%	10.3%	0.8%	1286
Nariño	60.0%	11.8%	14.9%	11.7%	1.5%	9300
Neiva	55.1%	15.6%	16.9%	11.9%	0.6%	3659
Norte de Santander	57.8%	13.1%	16.4%	11.8%	0.9%	8026
Palmira	59.0%	13.7%	14.8%	11.6%	0.8%	2836
Pasto	59.3%	11.6%	16.6%	11.9%	0.7%	4034
Pereira	56.9%	13.7%	16.0%	12.4%	1.0%	4350
Piedecuesta	61.9%	12.4%	15.5%	9.6%	0.6%	1482
Pitalito	55.4%	13.6%	18.4%	12.2%	0.4%	1584
Popayán	59.9%	13.8%	14.6%	10.8%	0.7%	3086
Putumayo	54.4%	15.4%	16.3%	12.5%	1.4%	4143
Quibdó	53.6%	17.5%	12.1%	14.3%	2.6%	1323
Quindío	54.1%	16.1%	16.7%	12.2%	0.9%	2449
Riohacha	51.9%	16.3%	14.6%	15.5%	1.7%	2582
Rionegro	60.4%	12.4%	14.7%	11.6%	0.9%	1185
Risaralda	55.4%	15.0%	16.0%	12.0%	1.5%	2810
Sabaneta	61.4%	12.7%	13.7%	11.5%	0.6%	511
Sahagún	53.6%	17.3%	12.9%	14.7%	1.5%	1213
San Andrés	56.8%	13.5%	15.3%	13.2%	1.3%	555
Santa Marta	55.5%	15.6%	14.1%	13.5%	1.3%	5823
Santander	59.5%	12.5%	16.3%	11.1%	0.6%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	55.6%	15.1%	14.9%	13.4%	1.0%	3218
Soacha	55.2%	14.3%	17.8%	12.0%	0.6%	5620
Sogamoso	61.3%	13.2%	14.4%	10.7%	0.3%	1503
Soledad	57.4%	14.2%	14.8%	12.4%	1.2%	5507
Sucre	52.8%	15.5%	15.3%	15.3%	1.1%	7731
Tolima	55.0%	14.2%	17.2%	12.4%	1.2%	9719
Tuluá	58.0%	14.7%	15.0%	11.7%	0.6%	2129
Tumaco	44.9%	17.9%	15.9%	18.2%	3.1%	2376
Tunja	65.3%	11.1%	13.0%	10.3%	0.4%	1871
Turbo	48.5%	17.8%	15.9%	16.1%	1.7%	2122
Uribia	40.2%	20.1%	17.5%	19.2%	3.0%	1095
Valle del Cauca	55.7%	15.5%	15.5%	12.5%	0.8%	8500
Valledupar	56.9%	14.4%	14.5%	13.4%	0.9%	5289
Vichada	43.8%	17.3%	20.5%	15.0%	3.3%	779
Villavicencio	59.5%	13.9%	14.6%	10.9%	1.1%	5786
Yopal	53.0%	15.2%	17.5%	13.3%	1.0%	2008
Yumbo	53.4%	16.3%	17.8%	11.7%	0.9%	1265
Zipaquirá	59.3%	11.5%	16.8%	11.6%	0.8%	1284
Colombia	56.1%	14.4%	15.8%	12.5%	1.2%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 38.

Un número de tres cifras es divisible por 11 si al sumar la primera cifra con la tercera y a este resultado restarle la segunda, se obtiene 0 ó un múltiplo de 11.

Por ejemplo, el número 869 es divisible por 11

Segunda cifra

8 6 9

Tercera cifra **Primera cifra** **porque (9 + 8) - 6 = 11.**

De acuerdo con lo anterior, el número 726 es divisible por 11 porque

A. (6 + 2) - 7 = 1
B. (6 + 7) - 2 = 11
C. (6 x 7) + 2 = 44
D. (6 x 2) + 7 = 19

• Estructura

Competencia	Razonamiento
Componente	Numérico - variacional
Afirmación	Justificar propiedades y relaciones numéricas usando ejemplos y contraejemplos.
Nivel de desempeño	Mínimo
Respuesta Correcta	B

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	10.5%	52.4%	22.8%	11.1%	3.2%	978
Antioquia	10.4%	58.9%	19.6%	9.4%	1.8%	29375
Apartadó	10.3%	55.2%	21.4%	10.6%	2.5%	1757
Arauca	8.2%	60.0%	20.4%	9.8%	1.5%	2680
Armenia	10.1%	58.5%	19.8%	10.0%	1.5%	2579
Atlántico	10.7%	54.7%	21.3%	10.0%	3.3%	5977
Barrancabermeja	10.0%	62.7%	17.0%	8.0%	2.3%	2488
Barranquilla	11.0%	59.8%	18.8%	8.9%	1.5%	12401
Bello	10.9%	61.5%	18.0%	8.5%	1.0%	3838
Bogotá, D.C.	8.6%	66.5%	16.1%	7.4%	1.4%	66881
Bolívar	11.6%	50.3%	23.4%	11.9%	2.8%	11164
Boyacá	8.9%	63.0%	18.5%	8.7%	0.9%	9267
Bucaramanga	8.9%	66.7%	16.2%	6.9%	1.2%	5302
Buenaventura	10.2%	56.9%	19.3%	10.2%	3.4%	4159
Buga	9.8%	62.9%	18.3%	7.9%	1.1%	1238
Caldas	9.2%	61.3%	19.5%	8.9%	1.1%	5750
Cali	9.8%	62.7%	17.1%	8.6%	1.8%	19640
Caquetá	10.0%	57.2%	21.2%	9.9%	1.6%	3262
Cartagena	10.7%	58.5%	18.9%	9.7%	2.2%	11456
Cartago	10.8%	61.6%	17.3%	8.8%	1.6%	1274
Casanare	8.9%	61.5%	19.4%	9.0%	1.2%	3072
Cauca	8.8%	61.1%	18.7%	8.9%	2.5%	12625
Cesar	11.2%	56.0%	20.9%	10.6%	1.3%	8484
Chocó	11.2%	52.2%	21.8%	12.3%	2.6%	3850
Chía	6.6%	67.5%	17.5%	7.1%	1.3%	1448
Ciénaga	10.9%	56.4%	19.7%	9.7%	3.2%	1515
Cundinamarca	8.1%	66.6%	16.8%	7.4%	1.0%	16373
Córdoba	11.5%	50.9%	23.3%	12.3%	1.9%	13353
Cúcuta	10.2%	61.1%	18.9%	8.5%	1.2%	7403
Dosquebradas	9.2%	64.5%	17.4%	7.8%	1.1%	1863
Duitama	6.2%	69.8%	16.8%	6.7%	0.5%	1408
Envigado	8.8%	66.2%	15.3%	9.0%	0.7%	1415
Facatativá	9.1%	67.5%	15.7%	6.9%	0.8%	1412
Florencia	10.8%	56.9%	20.4%	10.3%	1.5%	2074
Floridablanca	8.1%	65.9%	17.2%	7.7%	1.1%	2586
Fusagasugá	8.5%	66.8%	15.9%	7.7%	1.1%	1232
Girardot	10.1%	60.4%	16.6%	9.5%	3.4%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	10.0%	61.1%	19.6%	8.2%	1.1%	1523
Guainía	8.3%	58.8%	20.1%	9.3%	3.5%	517
Guaviare	10.8%	57.2%	20.0%	9.8%	2.1%	914
Huila	8.9%	62.6%	18.7%	8.8%	0.9%	8206
Ibagué	9.4%	65.2%	17.0%	7.5%	0.9%	5546
Ipiales	9.0%	64.1%	17.2%	9.0%	0.7%	1485
Itagüí	11.3%	58.6%	20.0%	8.7%	1.3%	2026
Jamundí	13.1%	56.1%	19.9%	9.1%	1.7%	1103
La Guajira	10.9%	54.9%	21.1%	10.7%	2.4%	3931
Lorica	10.4%	54.6%	21.2%	11.5%	2.2%	1541
Magangué	10.5%	52.3%	24.9%	10.8%	1.5%	1648
Magdalena	10.6%	54.2%	22.0%	10.4%	2.9%	9170
Maicao	11.6%	51.4%	22.0%	11.3%	3.7%	2162
Malambo	10.3%	56.9%	19.6%	10.8%	2.3%	1277
Manizales	9.6%	64.2%	17.4%	7.8%	1.0%	3144
Medellín	11.5%	57.4%	19.9%	9.5%	1.6%	20616
Meta	10.7%	58.4%	19.9%	9.4%	1.6%	6010
Montería	11.6%	54.6%	22.0%	10.4%	1.3%	5508
Mosquera	7.7%	69.7%	15.7%	5.7%	1.2%	1286
Nariño	7.7%	65.4%	17.3%	7.7%	1.9%	9300
Neiva	11.1%	61.8%	17.8%	8.3%	0.8%	3659
Norte de Santander	9.3%	63.8%	17.7%	8.2%	1.1%	8026
Palmira	10.2%	66.1%	15.5%	7.2%	1.0%	2836
Pasto	9.0%	65.0%	17.4%	7.6%	1.0%	4034
Pereira	9.6%	63.4%	17.4%	8.2%	1.5%	4350
Piedecuesta	10.1%	63.9%	17.5%	7.4%	1.1%	1482
Pitalito	10.5%	61.4%	18.6%	9.0%	0.6%	1584
Popayán	9.4%	66.0%	16.2%	7.4%	1.0%	3086
Putumayo	9.8%	58.5%	20.5%	9.3%	1.9%	4143
Quibdó	11.3%	52.9%	20.6%	11.9%	3.4%	1323
Quindío	10.4%	59.3%	19.2%	9.6%	1.5%	2449
Riohacha	12.6%	54.9%	20.8%	9.3%	2.4%	2582
Rionegro	9.5%	65.7%	15.9%	7.7%	1.2%	1185
Risaralda	9.1%	61.7%	18.1%	9.2%	1.9%	2810
Sabaneta	10.2%	62.8%	17.0%	9.4%	0.6%	511
Sahagún	10.2%	52.9%	23.9%	11.0%	1.9%	1213
San Andrés	10.5%	59.3%	19.5%	9.0%	1.8%	555
Santa Marta	10.3%	59.0%	19.7%	9.4%	1.5%	5823
Santander	8.5%	65.4%	17.5%	7.9%	0.8%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	10.8%	57.1%	20.4%	10.2%	1.4%	3218
Soacha	10.5%	63.6%	17.1%	7.6%	1.1%	5620
Sogamoso	8.7%	67.5%	15.9%	7.7%	0.2%	1503
Soledad	10.9%	61.0%	17.9%	8.4%	1.8%	5507
Sucre	10.9%	53.0%	23.2%	11.3%	1.6%	7731
Tolima	9.2%	61.4%	18.9%	9.0%	1.5%	9719
Tuluá	9.5%	64.0%	17.6%	7.8%	1.0%	2129
Tumaco	13.1%	48.0%	22.9%	12.3%	3.7%	2376
Tunja	10.1%	65.5%	16.7%	7.1%	0.6%	1871
Turbo	11.7%	51.4%	22.2%	12.3%	2.4%	2122
Uribia	10.8%	50.4%	25.6%	9.7%	3.6%	1095
Valle del Cauca	10.1%	60.8%	18.8%	9.1%	1.2%	8500
Valledupar	10.1%	62.4%	17.7%	8.7%	1.1%	5289
Vichada	10.1%	55.7%	20.9%	9.2%	4.0%	779
Villavicencio	9.6%	62.8%	18.2%	8.0%	1.4%	5786
Yopal	11.8%	60.4%	17.8%	8.3%	1.8%	2008
Yumbo	9.5%	59.8%	20.1%	9.3%	1.3%	1265
Zipaquirá	8.2%	68.6%	14.7%	7.8%	0.7%	1284
Colombia	9.9%	60.8%	18.8%	8.9%	1.6%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 39.

Juan y María están jugando a sacar fichas, sin mirar, de una bolsa que contiene: 1 ficha roja, 2 verdes, 1 amarilla y 2 negras.

María saca una ficha de la bolsa, ve que es roja y la deja fuera de la bolsa. A continuación, Juan saca otra ficha de la bolsa.

¿Cuál de las siguientes afirmaciones es verdadera?

A. La ficha que saca Juan seguramente es blanca.
B. La ficha que saca Juan seguramente es azul.
C. La ficha que saca Juan no puede ser amarilla.
D. La ficha que saca Juan no puede ser roja.

• Estructura

Competencia	Comunicación
Componente	Aleatorio
Afirmación	Expresar el grado de probabilidad de un evento, usando frecuencias o razones.
Nivel de desempeño	Avanzado
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	16.6%	22.0%	30.6%	26.9%	4.0%	978
Antioquia	14.6%	18.3%	30.2%	35.1%	2.0%	29375
Apartadó	16.4%	18.4%	26.2%	35.8%	3.1%	1757
Arauca	13.5%	17.1%	30.1%	37.5%	1.6%	2680
Armenia	13.5%	17.1%	29.6%	38.2%	1.7%	2579
Atlántico	16.2%	19.7%	27.7%	32.7%	3.8%	5977
Barrancabermeja	13.0%	15.4%	30.2%	39.0%	2.4%	2488
Barranquilla	14.8%	17.8%	28.0%	37.4%	2.0%	12401
Bello	13.3%	16.6%	28.8%	40.2%	1.1%	3838
Bogotá, D.C.	10.9%	15.5%	29.5%	42.5%	1.6%	66881
Bolívar	17.6%	21.0%	28.9%	29.3%	3.2%	11164
Boyacá	12.4%	18.2%	31.4%	36.7%	1.3%	9267
Bucaramanga	11.0%	14.2%	29.4%	44.2%	1.2%	5302
Buenaventura	14.7%	18.4%	28.1%	35.1%	3.8%	4159
Buga	13.9%	18.8%	26.9%	39.0%	1.4%	1238
Caldas	13.8%	17.4%	29.0%	38.5%	1.3%	5750
Cali	13.2%	16.2%	27.9%	40.6%	2.0%	19640
Caquetá	14.5%	18.9%	30.0%	34.5%	2.1%	3262
Cartagena	15.7%	18.3%	26.6%	36.8%	2.7%	11456
Cartago	13.3%	16.9%	27.9%	40.0%	2.0%	1274
Casanare	14.7%	17.8%	31.5%	34.5%	1.5%	3072
Cauca	14.3%	17.8%	29.1%	35.8%	3.1%	12625
Cesar	15.4%	18.6%	30.1%	34.1%	1.8%	8484
Chocó	17.3%	18.8%	28.2%	32.9%	2.8%	3850
Chía	10.4%	14.6%	27.2%	46.7%	1.0%	1448
Ciénaga	14.3%	19.0%	29.2%	34.1%	3.4%	1515
Cundinamarca	11.0%	16.1%	31.2%	40.5%	1.2%	16373
Córdoba	17.3%	21.3%	28.6%	30.4%	2.4%	13353
Cúcuta	13.4%	17.9%	29.2%	37.9%	1.6%	7403
Dosquebradas	11.3%	16.7%	31.2%	39.5%	1.3%	1863
Duitama	9.4%	15.8%	27.8%	46.3%	0.7%	1408
Envigado	10.2%	13.9%	24.1%	51.0%	0.9%	1415
Facatativá	12.3%	15.7%	30.5%	40.6%	1.0%	1412
Florencia	15.1%	18.3%	30.3%	34.2%	2.1%	2074
Floridablanca	10.2%	15.0%	28.3%	45.0%	1.4%	2586
Fusagasugá	11.3%	16.6%	31.1%	39.9%	1.1%	1232
Girardot	14.2%	18.0%	27.8%	36.6%	3.4%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	14.1%	17.9%	31.1%	35.5%	1.4%	1523
Guainía	18.6%	17.4%	30.2%	31.3%	2.5%	517
Guaviare	14.4%	18.7%	31.4%	33.0%	2.4%	914
Huila	13.0%	18.0%	31.8%	35.9%	1.3%	8206
Ibagué	12.4%	15.5%	29.0%	42.0%	1.2%	5546
Ipiales	12.8%	18.2%	32.7%	35.2%	1.1%	1485
Itagüí	14.6%	19.1%	27.6%	37.1%	1.6%	2026
Jamundí	15.6%	19.2%	29.8%	33.0%	2.4%	1103
La Guajira	16.2%	20.3%	28.1%	32.5%	3.0%	3931
Lorica	14.8%	17.8%	31.2%	33.1%	3.1%	1541
Magangué	15.6%	22.0%	30.7%	29.4%	2.2%	1648
Magdalena	16.0%	19.1%	27.6%	33.8%	3.4%	9170
Maicao	16.1%	20.1%	28.3%	31.5%	3.9%	2162
Malambo	15.1%	16.7%	30.3%	35.1%	2.8%	1277
Manizales	11.0%	16.1%	28.3%	43.1%	1.5%	3144
Medellín	14.7%	18.1%	29.4%	35.9%	1.9%	20616
Meta	14.6%	19.1%	31.2%	32.9%	2.2%	6010
Montería	16.7%	19.5%	29.4%	32.3%	2.1%	5508
Mosquera	10.0%	13.3%	30.4%	45.5%	0.9%	1286
Nariño	12.0%	15.9%	30.6%	39.2%	2.2%	9300
Neiva	13.8%	17.9%	29.9%	37.4%	1.1%	3659
Norte de Santander	13.0%	16.3%	30.7%	38.4%	1.6%	8026
Palmira	10.6%	16.5%	28.0%	43.2%	1.6%	2836
Pasto	11.9%	16.6%	31.5%	38.5%	1.4%	4034
Pereira	12.1%	15.7%	29.2%	41.4%	1.6%	4350
Piedecuesta	11.9%	14.4%	30.6%	42.0%	1.1%	1482
Pitalito	13.6%	18.4%	30.9%	36.1%	0.9%	1584
Popayán	11.1%	15.1%	30.0%	42.3%	1.6%	3086
Putumayo	14.1%	19.6%	29.9%	34.1%	2.3%	4143
Quibdó	14.4%	19.0%	27.6%	35.1%	3.9%	1323
Quindío	13.2%	18.4%	31.0%	35.8%	1.6%	2449
Riohacha	15.3%	21.4%	28.9%	31.4%	3.0%	2582
Rionegro	11.2%	15.0%	28.0%	44.7%	1.0%	1185
Risaralda	12.6%	18.2%	29.0%	38.1%	2.1%	2810
Sabaneta	8.2%	15.1%	27.0%	48.3%	1.4%	511
Sahagún	14.7%	19.8%	30.7%	32.9%	2.0%	1213
San Andrés	16.4%	19.6%	30.6%	30.1%	3.2%	555
Santa Marta	15.4%	18.8%	29.8%	33.9%	2.2%	5823
Santander	12.4%	17.0%	30.8%	38.9%	1.0%	8664

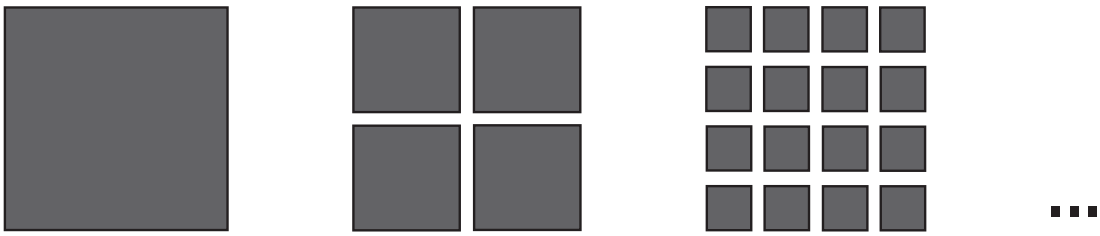
Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	17.8%	18.2%	28.7%	33.3%	2.0%	3218
Soacha	13.4%	17.2%	30.6%	37.2%	1.7%	5620
Sogamoso	11.6%	17.2%	31.0%	39.5%	0.6%	1503
Soledad	13.6%	17.4%	30.1%	36.8%	2.1%	5507
Sucre	16.6%	19.7%	29.3%	32.6%	1.7%	7731
Tolima	14.0%	17.4%	30.7%	36.0%	2.0%	9719
Tuluá	14.0%	15.6%	27.1%	41.9%	1.3%	2129
Tumaco	19.4%	21.6%	27.6%	26.8%	4.6%	2376
Tunja	10.3%	17.0%	29.1%	42.8%	0.7%	1871
Turbo	18.0%	19.5%	27.2%	32.5%	2.9%	2122
Uribia	20.8%	21.4%	25.4%	27.9%	4.6%	1095
Valle del Cauca	13.9%	18.1%	28.0%	38.7%	1.3%	8500
Valledupar	14.9%	17.4%	29.0%	37.2%	1.5%	5289
Vichada	15.0%	20.9%	29.4%	31.2%	3.5%	779
Villavicencio	13.5%	16.4%	29.6%	38.6%	1.9%	5786
Yopal	14.4%	17.5%	31.9%	34.3%	1.9%	2008
Yumbo	12.9%	17.1%	29.3%	39.4%	1.3%	1265
Zipaquirá	10.7%	13.4%	29.5%	45.2%	1.2%	1284
Colombia	13.7%	17.5%	29.4%	37.4%	1.9%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

- **Pregunta 40.**

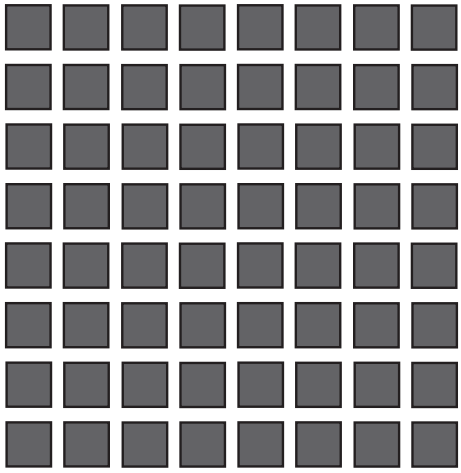
Observa la secuencia.



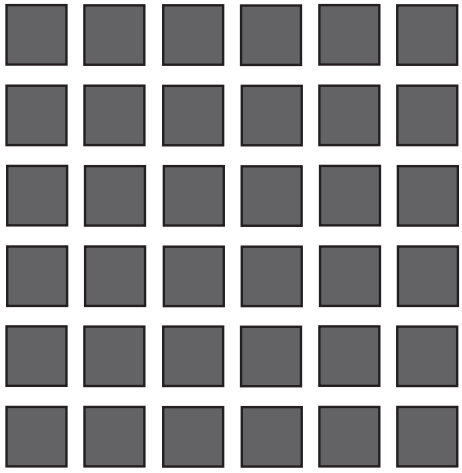
Paso 1 **Paso 2** **Paso 3** ...

¿Cuál es la figura que sigue en la secuencia?

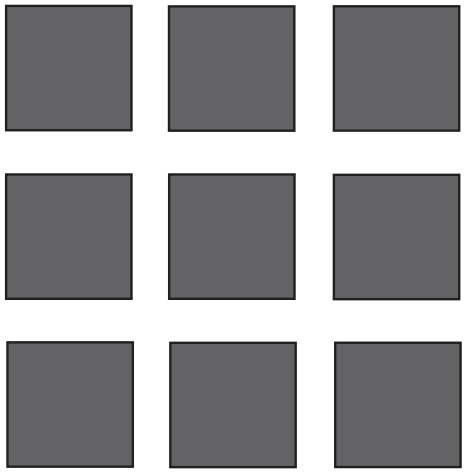
A.



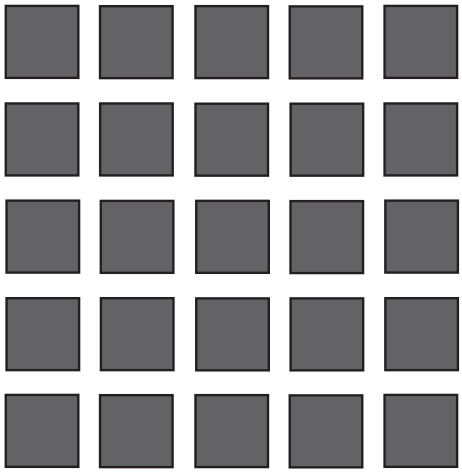
B.



C.



D.



• Estructura

Competencia	Resolución
Componente	Espacial - métrico
Afirmación	Usar representaciones geométricas y establecer relaciones entre ellas para solucionar problemas.
Nivel de desempeño	Avanzado
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	29.4%	22.2%	24.4%	20.6%	3.4%	978
Antioquia	37.1%	21.5%	19.0%	20.4%	2.0%	29375
Apartadó	36.0%	19.7%	19.3%	21.7%	3.3%	1757
Arauca	41.2%	20.4%	17.1%	19.7%	1.5%	2680
Armenia	38.0%	23.2%	15.4%	21.5%	1.8%	2579
Atlántico	33.7%	21.9%	19.2%	21.4%	3.7%	5977
Barrancabermeja	37.8%	23.4%	15.7%	21.0%	2.2%	2488
Barranquilla	38.1%	22.8%	15.6%	21.7%	1.7%	12401
Bello	39.6%	23.1%	16.2%	20.1%	1.1%	3838
Bogotá, D.C.	41.8%	23.2%	12.0%	21.5%	1.5%	66881
Bolívar	31.4%	21.5%	22.7%	21.2%	3.3%	11164
Boyacá	41.0%	21.9%	16.0%	20.1%	1.0%	9267
Bucaramanga	42.1%	24.7%	11.6%	20.5%	1.1%	5302
Buenaventura	36.6%	21.6%	18.9%	18.7%	4.3%	4159
Buga	41.6%	21.1%	16.8%	19.1%	1.5%	1238
Caldas	39.4%	22.1%	17.6%	19.7%	1.2%	5750
Cali	39.5%	22.2%	15.2%	21.2%	1.9%	19640
Caquetá	35.2%	20.9%	21.9%	20.3%	1.7%	3262
Cartagena	37.5%	21.5%	18.0%	20.3%	2.7%	11456
Cartago	38.6%	23.7%	16.5%	19.7%	1.5%	1274
Casanare	37.6%	22.4%	17.9%	20.9%	1.3%	3072
Cauca	38.9%	20.0%	19.4%	19.0%	2.7%	12625
Cesar	35.5%	21.9%	20.7%	20.2%	1.8%	8484
Chocó	32.0%	23.4%	22.0%	19.4%	3.2%	3850
Chía	43.0%	22.0%	10.9%	23.0%	1.1%	1448

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Ciénaga	32.5%	21.7%	20.6%	21.4%	3.8%	1515
Cundinamarca	43.6%	21.7%	13.8%	19.6%	1.2%	16373
Córdoba	33.7%	21.1%	22.5%	20.5%	2.1%	13353
Cúcuta	40.6%	22.2%	15.2%	20.7%	1.3%	7403
Dosquebradas	40.5%	23.0%	14.3%	21.1%	1.1%	1863
Duitama	48.7%	21.7%	11.4%	18.0%	0.3%	1408
Envigado	44.2%	25.1%	10.7%	19.1%	0.8%	1415
Facatativá	45.7%	21.6%	13.2%	19.0%	0.6%	1412
Florencia	35.9%	22.5%	18.1%	21.9%	1.6%	2074
Floridablanca	46.7%	21.7%	11.9%	18.5%	1.2%	2586
Fusagasugá	42.0%	20.9%	14.7%	21.0%	1.4%	1232
Girardot	38.8%	20.9%	14.3%	22.8%	3.2%	895
Girón	38.3%	24.6%	15.0%	21.5%	0.7%	1523
Guainía	36.4%	16.4%	20.9%	23.0%	3.3%	517
Guaviare	35.1%	22.0%	19.1%	21.9%	1.9%	914
Huila	38.8%	22.4%	18.6%	19.2%	1.1%	8206
Ibagué	42.9%	22.8%	14.4%	18.8%	1.0%	5546
Ipiales	45.4%	21.3%	13.0%	18.9%	1.3%	1485
Itagüí	40.2%	21.9%	16.6%	19.9%	1.4%	2026
Jamundí	33.3%	26.0%	16.4%	22.4%	1.9%	1103
La Guajira	34.5%	22.5%	19.8%	20.2%	3.0%	3931
Lorica	35.1%	22.5%	20.3%	19.1%	2.9%	1541
Magangué	33.8%	22.1%	18.6%	23.6%	1.9%	1648
Magdalena	34.3%	21.2%	21.5%	19.8%	3.2%	9170
Maicao	31.3%	23.1%	22.1%	19.9%	3.7%	2162
Malambo	37.2%	22.5%	16.4%	21.5%	2.4%	1277
Manizales	39.6%	23.4%	14.2%	21.4%	1.3%	3144
Medellín	37.1%	22.4%	16.9%	21.8%	1.8%	20616
Meta	36.4%	21.4%	19.2%	20.7%	2.3%	6010
Montería	35.3%	22.6%	19.2%	21.1%	1.7%	5508
Mosquera	41.7%	22.9%	12.4%	21.8%	1.3%	1286
Nariño	42.4%	19.8%	17.1%	18.9%	1.8%	9300
Neiva	38.5%	24.2%	15.9%	20.2%	1.1%	3659
Norte de Santander	41.9%	21.3%	16.3%	19.3%	1.3%	8026
Palmira	43.8%	21.7%	13.4%	19.6%	1.4%	2836
Pasto	42.7%	22.8%	12.2%	21.2%	1.0%	4034
Pereira	39.5%	22.4%	15.5%	21.2%	1.4%	4350
Piedecuesta	44.5%	23.6%	11.6%	19.3%	0.9%	1482
Pitalito	40.3%	21.7%	18.6%	18.6%	0.8%	1584

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Popayán	43.6%	21.1%	14.6%	19.2%	1.4%	3086
Putumayo	38.9%	20.0%	20.0%	18.8%	2.3%	4143
Quibdó	35.8%	20.9%	20.3%	19.3%	3.6%	1323
Quindío	37.7%	22.4%	17.8%	20.3%	1.8%	2449
Riohacha	34.9%	22.0%	19.8%	20.7%	2.7%	2582
Rionegro	39.5%	24.2%	12.0%	22.6%	1.7%	1185
Risaralda	41.1%	20.3%	19.3%	17.1%	2.3%	2810
Sabaneta	40.3%	26.4%	11.7%	20.5%	1.0%	511
Sahagún	36.8%	21.2%	18.5%	20.8%	2.7%	1213
San Andrés	37.5%	22.9%	19.6%	18.2%	1.8%	555
Santa Marta	36.5%	21.8%	17.5%	21.9%	2.3%	5823
Santander	43.8%	21.8%	15.1%	18.3%	0.9%	8664
Sincelejo	36.9%	22.1%	18.7%	20.6%	1.7%	3218
Soacha	41.2%	22.5%	13.7%	21.2%	1.4%	5620
Sogamoso	45.6%	20.9%	13.3%	19.9%	0.3%	1503
Soledad	39.5%	22.0%	15.4%	21.3%	1.8%	5507
Sucre	33.1%	21.1%	22.4%	21.6%	1.8%	7731
Tolima	39.0%	21.2%	18.3%	19.8%	1.8%	9719
Tuluá	39.1%	22.3%	15.9%	21.7%	1.1%	2129
Tumaco	30.0%	22.1%	21.0%	21.8%	5.2%	2376
Tunja	46.1%	22.2%	12.2%	18.7%	0.9%	1871
Turbo	29.6%	22.0%	22.7%	23.0%	2.7%	2122
Uribia	27.9%	23.7%	26.0%	17.9%	4.4%	1095
Valle del Cauca	39.7%	21.7%	17.6%	19.8%	1.3%	8500
Valledupar	39.4%	22.5%	16.6%	19.9%	1.6%	5289
Vichada	37.9%	15.8%	23.0%	19.4%	4.0%	779
Villavicencio	40.1%	23.0%	14.1%	21.3%	1.5%	5786
Yopal	38.9%	24.4%	14.5%	20.7%	1.4%	2008
Yumbo	38.5%	22.2%	14.1%	24.0%	1.2%	1265
Zipaquirá	43.5%	22.7%	10.5%	22.4%	0.9%	1284
Colombia	38.9%	22.1%	16.7%	20.5%	1.8%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 41.

En la siguiente ficha aparece información incompleta de algunas medidas tomadas por Daniel.

Largo de un lápiz: 20,5 centímetros **Ancho de una regla:** 17 milímetros **Estatura de Francisco:** 1,35

¿Con cuál de las siguientes unidades se completa la información de la estatura de Francisco?

A. Metros.
B. Decámetros.
C. Decímetros.
D. Milímetros.

• Estructura

Competencia	Comunicación
Componente	Espacial - métrico
Afirmación	Identificar unidades tanto estandarizadas como no convencionales apropiadas para diferentes mediciones y establecer relaciones entre ellas.
Nivel de desempeño	Satisfactorio
Respuesta Correcta	A

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	39.5%	16.8%	17.1%	22.5%	4.2%	978
Antioquia	48.7%	13.4%	17.5%	18.4%	2.0%	29375
Apartadó	45.4%	13.3%	17.0%	20.9%	3.4%	1757
Arauca	49.7%	13.7%	17.8%	17.0%	1.8%	2680
Armenia	48.4%	14.9%	18.9%	16.2%	1.7%	2579
Atlántico	43.5%	15.0%	18.8%	18.7%	4.0%	5977
Barrancabermeja	51.1%	14.0%	17.6%	15.0%	2.3%	2488
Barranquilla	49.4%	14.4%	18.5%	15.9%	1.8%	12401
Bello	52.0%	13.9%	16.8%	16.0%	1.4%	3838
Bogotá, D.C.	53.8%	12.4%	17.9%	14.3%	1.6%	66881
Bolívar	41.0%	16.1%	17.8%	21.8%	3.3%	11164
Boyacá	50.1%	13.0%	19.9%	15.9%	1.0%	9267
Bucaramanga	54.8%	12.1%	18.7%	13.0%	1.3%	5302
Buenaventura	44.7%	13.4%	15.9%	21.6%	4.4%	4159
Buga	54.8%	12.9%	15.5%	15.6%	1.1%	1238
Caldas	49.1%	13.4%	18.1%	18.1%	1.3%	5750
Cali	53.2%	13.1%	16.1%	15.7%	1.9%	19640
Caquetá	45.5%	13.2%	18.1%	21.4%	1.8%	3262
Cartagena	49.4%	14.1%	16.6%	17.3%	2.6%	11456
Cartago	47.8%	12.8%	19.2%	18.8%	1.4%	1274
Casanare	48.2%	14.0%	19.9%	16.1%	1.8%	3072
Cauca	49.5%	11.5%	15.8%	20.4%	2.9%	12625
Cesar	46.5%	14.5%	15.9%	21.2%	1.8%	8484
Chocó	47.4%	13.3%	14.8%	21.6%	3.0%	3850
Chía	59.2%	10.8%	15.9%	13.0%	1.1%	1448
Ciénaga	44.5%	15.4%	17.1%	19.6%	3.4%	1515
Cundinamarca	53.0%	12.5%	18.4%	14.8%	1.3%	16373
Córdoba	43.1%	16.0%	17.8%	21.0%	2.1%	13353
Cúcuta	51.1%	14.0%	18.6%	15.1%	1.2%	7403
Dosquebradas	51.7%	12.8%	17.9%	16.6%	0.9%	1863
Duitama	58.7%	12.0%	17.5%	11.4%	0.4%	1408
Envigado	59.1%	12.5%	16.7%	10.8%	0.8%	1415
Facatativá	56.0%	10.7%	18.3%	14.2%	0.7%	1412
Florencia	43.7%	16.0%	19.0%	19.1%	2.2%	2074
Floridablanca	54.3%	13.1%	19.4%	12.3%	1.0%	2586
Fusagasugá	52.8%	12.3%	18.1%	15.0%	1.9%	1232
Girardot	49.8%	13.3%	17.8%	16.0%	3.1%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	49.7%	14.8%	19.6%	14.6%	1.2%	1523
Guainía	43.3%	13.9%	18.8%	20.7%	3.3%	517
Guaviare	44.5%	14.3%	19.3%	19.5%	2.4%	914
Huila	50.4%	12.0%	18.2%	18.5%	0.9%	8206
Ibagué	54.4%	12.8%	17.1%	14.5%	1.2%	5546
Ipiales	52.3%	12.9%	18.5%	15.3%	1.1%	1485
Itagüí	48.2%	15.8%	19.5%	15.1%	1.4%	2026
Jamundí	43.8%	16.6%	21.8%	16.2%	1.6%	1103
La Guajira	43.0%	13.7%	17.5%	22.6%	3.1%	3931
Lorica	46.2%	12.7%	16.9%	21.7%	2.5%	1541
Magangué	43.1%	14.6%	17.9%	22.6%	1.8%	1648
Magdalena	46.1%	13.6%	15.9%	21.3%	3.1%	9170
Maicao	40.3%	15.4%	17.7%	23.7%	2.8%	2162
Malambo	50.6%	13.9%	15.4%	17.8%	2.3%	1277
Manizales	54.4%	11.6%	18.8%	14.4%	0.9%	3144
Medellín	46.4%	15.8%	19.6%	16.3%	1.9%	20616
Meta	44.5%	15.4%	20.6%	17.3%	2.2%	6010
Montería	46.0%	16.3%	17.9%	17.8%	2.0%	5508
Mosquera	54.5%	11.7%	18.0%	14.8%	0.9%	1286
Nariño	55.0%	9.9%	16.2%	16.8%	2.1%	9300
Neiva	49.3%	14.5%	19.9%	15.4%	1.0%	3659
Norte de Santander	52.0%	12.1%	18.3%	16.3%	1.3%	8026
Palmira	54.1%	13.0%	17.2%	14.3%	1.4%	2836
Pasto	52.9%	12.1%	18.7%	15.1%	1.1%	4034
Pereira	53.4%	13.0%	16.6%	15.7%	1.4%	4350
Piedecuesta	53.2%	11.8%	21.3%	12.8%	0.9%	1482
Pitalito	48.5%	13.7%	19.4%	17.4%	1.0%	1584
Popayán	51.0%	12.3%	19.6%	15.9%	1.2%	3086
Putumayo	46.0%	14.3%	18.4%	19.1%	2.3%	4143
Quibdó	45.8%	15.3%	18.0%	17.1%	3.9%	1323
Quindío	47.9%	13.7%	17.5%	19.1%	1.8%	2449
Riohacha	42.3%	16.8%	17.7%	20.7%	2.5%	2582
Rionegro	57.6%	10.4%	17.0%	13.8%	1.3%	1185
Risaralda	52.6%	11.1%	15.4%	18.7%	2.2%	2810
Sabaneta	56.6%	12.3%	15.9%	14.5%	0.8%	511
Sahagún	45.0%	16.2%	18.0%	19.0%	1.9%	1213
San Andrés	42.7%	18.9%	18.0%	19.3%	1.1%	555
Santa Marta	47.3%	14.8%	17.9%	17.7%	2.3%	5823
Santander	54.5%	11.4%	17.9%	15.1%	1.1%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	46.8%	15.8%	19.3%	16.5%	1.7%	3218
Soacha	50.0%	14.4%	18.6%	15.7%	1.2%	5620
Sogamoso	55.3%	13.6%	19.5%	11.4%	0.3%	1503
Soledad	52.8%	13.2%	17.1%	15.0%	2.0%	5507
Sucre	45.9%	14.8%	17.3%	20.3%	1.7%	7731
Tolima	49.6%	12.8%	16.4%	19.3%	1.9%	9719
Tuluá	53.0%	12.0%	17.1%	16.6%	1.2%	2129
Tumaco	37.4%	16.0%	18.5%	23.3%	4.8%	2376
Tunja	55.4%	11.6%	19.0%	13.2%	0.8%	1871
Turbo	37.7%	16.8%	20.2%	22.5%	2.8%	2122
Uribia	36.2%	15.0%	16.9%	27.0%	4.9%	1095
Valle del Cauca	49.6%	13.2%	17.9%	18.0%	1.3%	8500
Valledupar	49.9%	12.8%	17.3%	18.2%	1.8%	5289
Vichada	43.6%	13.4%	17.2%	22.3%	3.5%	779
Villavicencio	50.5%	14.3%	18.9%	14.6%	1.7%	5786
Yopal	48.3%	15.1%	19.6%	15.2%	1.7%	2008
Yumbo	52.3%	13.2%	16.9%	15.9%	1.7%	1265
Zipaquirá	57.4%	11.4%	16.3%	13.9%	0.9%	1284
Colombia	49.7%	13.5%	17.8%	17.1%	1.9%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

• Pregunta 42.

En un grupo de danza, 40 personas van a participar en un baile típico. Se necesita que por cada 3 hombres haya 2 mujeres.

¿Cuántos hombres se necesitan en total?

A. 5
B. 6
C. 17
D. 24

• Estructura

Competencia	Resolución
Componente	Numérico - variacional
Afirmación	Resolver y formular problemas que requieren el uso de la fracción como parte de un todo, como cociente y como razón.
Nivel de desempeño	Avanzado
Respuesta Correcta	D

• Resultados a nivel de Entidad Territorial certificada (ETC)

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Amazonas	27.4%	23.4%	18.1%	27.1%	4.0%	978
Antioquia	19.8%	20.3%	20.8%	37.1%	2.0%	29375
Apartadó	22.9%	19.9%	19.1%	34.9%	3.2%	1757
Arauca	19.6%	19.7%	20.1%	38.8%	1.8%	2680
Armenia	16.9%	21.2%	24.7%	35.4%	1.8%	2579
Atlántico	24.4%	21.1%	18.3%	32.4%	3.8%	5977
Barrancabermeja	20.6%	21.7%	21.7%	34.0%	2.0%	2488
Barranquilla	21.5%	21.9%	20.5%	34.2%	1.9%	12401
Bello	18.3%	19.6%	24.4%	36.5%	1.2%	3838
Bogotá, D.C.	16.0%	19.3%	24.9%	38.2%	1.7%	66881
Bolívar	27.2%	22.4%	17.8%	29.6%	3.0%	11164
Boyacá	17.3%	20.2%	21.1%	40.2%	1.2%	9267
Bucaramanga	15.4%	18.9%	24.9%	39.4%	1.5%	5302
Buenaventura	23.2%	21.8%	17.5%	33.7%	3.9%	4159
Buga	19.1%	22.9%	21.1%	35.7%	1.3%	1238
Caldas	19.7%	20.0%	20.2%	39.0%	1.2%	5750
Cali	18.7%	21.0%	22.0%	36.3%	2.0%	19640
Caquetá	21.8%	19.4%	19.8%	37.6%	1.5%	3262
Cartagena	23.6%	19.9%	19.0%	35.1%	2.5%	11456
Cartago	20.6%	22.4%	22.3%	32.9%	1.8%	1274
Casanare	18.8%	21.8%	21.3%	36.2%	2.0%	3072
Cauca	21.7%	22.2%	15.7%	37.5%	2.9%	12625
Cesar	24.7%	21.0%	17.9%	34.7%	1.7%	8484
Chocó	26.6%	23.2%	15.2%	32.2%	2.8%	3850
Chía	12.8%	16.8%	26.0%	43.2%	1.2%	1448
Ciénaga	24.3%	22.0%	17.5%	33.3%	2.9%	1515
Cundinamarca	16.1%	19.3%	22.2%	41.0%	1.4%	16373
Córdoba	26.1%	22.0%	18.5%	31.6%	1.9%	13353
Cúcuta	20.3%	20.8%	21.0%	36.5%	1.4%	7403
Dosquebradas	20.0%	21.7%	23.6%	33.7%	1.0%	1863
Duitama	14.3%	17.5%	25.1%	42.7%	0.5%	1408
Envigado	13.2%	16.2%	26.1%	43.5%	1.0%	1415
Facatativá	14.4%	20.5%	26.5%	37.8%	0.8%	1412
Florencia	23.9%	20.6%	20.7%	33.3%	1.5%	2074
Floridablanca	15.5%	19.5%	21.9%	42.1%	1.0%	2586
Fusagasugá	17.0%	19.0%	26.2%	36.1%	1.7%	1232
Girardot	24.1%	21.5%	18.4%	33.0%	3.0%	895

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Girón	18.5%	19.8%	20.6%	39.7%	1.5%	1523
Guainía	24.2%	26.1%	15.7%	30.2%	3.9%	517
Guaviare	20.0%	24.9%	19.8%	32.8%	2.4%	914
Huila	20.5%	20.6%	19.0%	38.8%	1.0%	8206
Ibagué	16.7%	19.7%	21.7%	40.9%	1.1%	5546
Ipiales	17.1%	21.6%	20.1%	40.1%	1.1%	1485
Itagüí	19.5%	20.4%	23.1%	35.6%	1.4%	2026
Jamundí	21.3%	20.9%	21.8%	34.1%	1.8%	1103
La Guajira	26.2%	21.5%	16.9%	32.7%	2.6%	3931
Lorica	23.8%	23.4%	16.7%	33.9%	2.3%	1541
Magangué	28.5%	21.4%	17.7%	30.8%	1.7%	1648
Magdalena	25.9%	21.0%	16.8%	33.2%	3.0%	9170
Maicao	25.0%	22.2%	20.7%	29.2%	2.9%	2162
Malambo	24.5%	20.3%	15.7%	37.1%	2.3%	1277
Manizales	17.1%	21.0%	24.2%	36.6%	1.2%	3144
Medellín	18.6%	20.2%	24.6%	34.8%	1.8%	20616
Meta	20.0%	20.5%	21.6%	35.9%	2.0%	6010
Montería	24.0%	21.1%	20.4%	32.4%	2.1%	5508
Mosquera	16.3%	20.1%	24.8%	37.4%	1.3%	1286
Nariño	18.3%	22.3%	16.2%	41.1%	2.1%	9300
Neiva	21.2%	21.8%	21.5%	34.2%	1.4%	3659
Norte de Santander	19.1%	19.8%	19.9%	39.8%	1.4%	8026
Palmira	16.0%	21.7%	22.1%	38.6%	1.6%	2836
Pasto	16.8%	22.2%	21.7%	37.9%	1.5%	4034
Pereira	18.3%	20.8%	22.2%	37.1%	1.6%	4350
Piedecuesta	16.0%	19.6%	22.0%	41.4%	1.1%	1482
Pitalito	19.4%	22.0%	20.6%	36.9%	0.9%	1584
Popayán	17.7%	21.7%	20.8%	38.4%	1.4%	3086
Putumayo	20.1%	22.3%	19.7%	35.6%	2.2%	4143
Quibdó	24.3%	20.1%	18.6%	33.6%	3.3%	1323
Quindío	21.6%	21.4%	21.5%	33.8%	1.7%	2449
Riohacha	25.3%	21.2%	19.9%	31.1%	2.5%	2582
Rionegro	15.1%	19.5%	24.1%	40.2%	1.1%	1185
Risaralda	21.7%	20.3%	18.7%	37.4%	1.9%	2810
Sabaneta	13.1%	18.6%	27.4%	39.9%	1.0%	511
Sahagún	21.1%	23.3%	19.6%	34.3%	1.6%	1213
San Andrés	24.7%	22.0%	22.0%	30.8%	0.5%	555
Santa Marta	23.1%	20.1%	20.7%	34.3%	1.8%	5823
Santander	17.4%	19.9%	18.9%	43.0%	0.9%	8664

Continúa en la siguiente página

ETC/País	A	B	C	D	Omisión y multimarca	N° estudiantes
Sincelejo	23.5%	20.4%	22.0%	32.7%	1.4%	3218
Soacha	18.0%	20.7%	22.3%	37.7%	1.3%	5620
Sogamoso	14.0%	19.1%	26.1%	40.4%	0.4%	1503
Soledad	21.1%	20.2%	20.6%	36.3%	1.8%	5507
Sucre	26.5%	22.7%	17.7%	31.6%	1.6%	7731
Tolima	20.4%	21.4%	18.4%	38.0%	1.8%	9719
Tuluá	19.7%	20.2%	21.3%	38.0%	0.8%	2129
Tumaco	28.0%	23.1%	17.7%	26.4%	4.7%	2376
Tunja	14.9%	19.2%	23.3%	41.7%	0.9%	1871
Turbo	27.0%	22.9%	17.1%	30.6%	2.5%	2122
Uribia	29.6%	21.5%	15.9%	28.0%	5.0%	1095
Valle del Cauca	19.2%	21.0%	20.4%	37.9%	1.6%	8500
Valledupar	23.1%	20.0%	18.7%	36.9%	1.3%	5289
Vichada	25.0%	24.5%	16.7%	30.0%	3.7%	779
Villavicencio	16.8%	20.5%	22.1%	39.0%	1.6%	5786
Yopal	18.1%	20.4%	23.0%	36.8%	1.7%	2008
Yumbo	19.5%	24.0%	21.3%	33.4%	1.8%	1265
Zipaquirá	15.3%	18.3%	24.9%	40.3%	1.2%	1284
Colombia	20.0%	20.6%	21.0%	36.5%	1.9%	497504

*Es posible que los porcentajes mostrados no sumen exactamente 100 debido a aproximaciones decimales.

Carrera 7 No. 32 - 12 • Teléfono:(57-1) 484-1460 • PBX: (57+1) 484-1410 • Línea Nacional Gratuita 018000-519535
Bogotá - Colombia • www.icfes.gov.co